Connecting via Winsock to STN

Welcome to STN International! Enter x:x

LOGINID:SSSPTA1626GMS

PASSWORD:
TERMINAL (ENTER 1, 2, 3, OR ?):2

* * * * * * * * * * Welcome to STN International * * * * * * * * * *

| | | | |
|---|---|---|---|
| NEWS | 1 | | Web Page URLs for STN Seminar Schedule - N. America |
| NEWS | 2 | | "Ask CAS" for self-help around the clock |
| NEWS | 3 | FEB 28 | PATDPAFULL - New display fields provide for legal status data from INPADOC |
| NEWS | 4 | FEB 28 | BABS - Current-awareness alerts (SDIs) available |
| NEWS | 5 | MAR 02 | GBFULL: New full-text patent database on STN |
| NEWS | 6 | MAR 03 | REGISTRY/ZREGISTRY - Sequence annotations enhanced |
| NEWS | 7 | MAR 03 | MEDLINE file segment of TOXCENTER reloaded |
| NEWS | 8 | MAR 22 | KOREAPAT now updated monthly; patent information enhanced |
| NEWS | 9 | MAR 22 | Original IDE display format returns to REGISTRY/ZREGISTRY |
| NEWS | 10 | MAR 22 | PATDPASPC - New patent database available |
| NEWS | 11 | MAR 22 | REGISTRY/ZREGISTRY enhanced with experimental property tags |
| NEWS | 12 | APR 04 | EPFULL enhanced with additional patent information and new fields |
| NEWS | 13 | APR 04 | EMBASE - Database reloaded and enhanced |
| NEWS | 14 | APR 18 | New CAS Information Use Policies available online |
| NEWS | 15 | APR 25 | Patent searching, including current-awareness alerts (SDIs), based on application date in CA/CAplus and USPATFULL/USPAT2 may be affected by a change in filing date for U.S. applications. |
| NEWS | 16 | APR 28 | Improved searching of U.S. Patent Classifications for U.S. patent records in CA/CAplus |
| NEWS | 17 | MAY 23 | GBFULL enhanced with patent drawing images |
| NEWS | 18 | MAY 23 | REGISTRY has been enhanced with source information from CHEMCATS |
| NEWS | 19 | JUN 06 | The Analysis Edition of STN Express with Discover! (Version 8.0 for Windows) now available |
| NEWS | 20 | JUN 13 | RUSSIAPAT: New full-text patent database on STN |
| NEWS | 21 | JUN 13 | FRFULL enhanced with patent drawing images |
| NEWS | 22 | JUN 27 | MARPAT displays enhanced with expanded G-group definitions and text labels |
| NEWS | 23 | JUL 01 | MEDICONF removed from STN |
| NEWS | 24 | JUL 07 | STN Patent Forums to be held in July 2005 |
| NEWS | 25 | JUL 13 | SCISEARCH reloaded |
| NEWS | 26 | JUL 20 | Powerful new interactive analysis and visualization software, STN AnaVist, now available |
| NEWS | 27 | AUG 11 | Derwent World Patents Index(R) web-based training during August |
| NEWS | 28 | AUG 11 | STN AnaVist workshops to be held in North America |

NEWS EXPRESS JUNE 13 CURRENT WINDOWS VERSION IS V8.0, CURRENT
MACINTOSH VERSION IS V6.0c(ENG) AND V6.0Jc(JP),
AND CURRENT DISCOVER FILE IS DATED 13 JUNE 2005

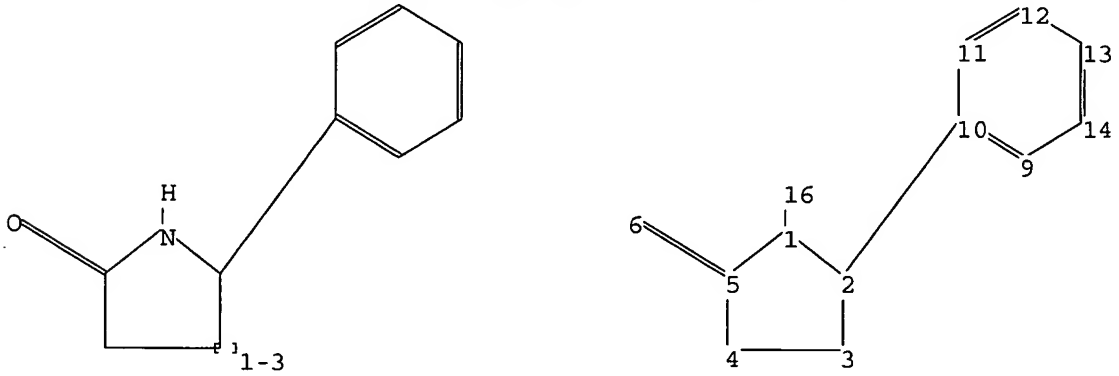
```
 NEWS HOURS     STN Operating Hours Plus Help Desk Availability
 NEWS INTER     General Internet Information
 NEWS LOGIN     Welcome Banner and News Items
 NEWS PHONE     Direct Dial and Telecommunication Network Access to STN
 NEWS WWW       CAS World Wide Web Site (general information)

Enter NEWS followed by the item number or name to see news on that
specific topic.

  All use of STN is subject to the provisions of the STN Customer
  agreement.  Please note that this agreement limits use to scientific
  research.  Use for software development or design or implementation
  of commercial gateways or other similar uses is prohibited and may
  result in loss of user privileges and other penalties.

  * * * * * * * * * * * * * * STN  Columbus  * * * * * * * * * * * * * * * *

FILE 'HOME' ENTERED AT 16:21:44 ON 29 AUG 2005

=>
Uploading
THIS COMMAND NOT AVAILABLE IN THE CURRENT FILE
Do you want to switch to the Registry File?
Choice (Y/n):
Switching to the Registry File...
Some commands only work in certain files.  For example, the EXPAND
command can only be used to look at the index in a file which has an
index.  Enter "HELP COMMANDS" at an arrow prompt (=>) for a list of
commands which can be used in this file.

=> FILE REGISTRY

COST IN U.S. DOLLARS                                SINCE FILE      TOTAL
                                                         ENTRY    SESSION
FULL ESTIMATED COST                                       0.21       0.21

FILE 'REGISTRY' ENTERED AT 16:22:03 ON 29 AUG 2005
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.
COPYRIGHT (C) 2005 American Chemical Society (ACS)

Property values tagged with IC are from the ZIC/VINITI data file
provided by InfoChem.

STRUCTURE FILE UPDATES:   28 AUG 2005  HIGHEST RN 861926-07-0
DICTIONARY FILE UPDATES:  28 AUG 2005  HIGHEST RN 861926-07-0

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH JULY 14, 2005

  Please note that search-term pricing does apply when
  conducting SmartSELECT searches.

*********************************************************************
*                                                                   *
* The CA roles and document type information have been removed from *
* the IDE default display format and the ED field has been added,   *
```

* effective March 20, 2005. A new display format, IDERL, is now *
* available and contains the CA role and document type information. *
*
**********

Structure search iteration limits have been increased. See HELP SLIMITS for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at:
http://www.cas.org/ONLINE/DBSS/registryss.html

=>
Uploading C:\Program Files\Stnexp\Queries\10768294.str

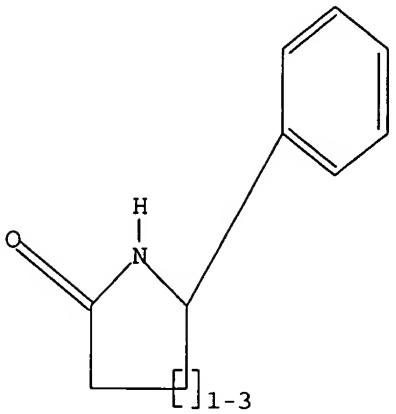



chain nodes :
6 16
ring nodes :
1 2 3 4 5 9 10 11 12 13 14
chain bonds :
1-16 2-10 5-6
ring bonds :
1-2 1-5 2-3 3-4 4-5 9-10 9-14 10-11 11-12 12-13 13-14
exact/norm bonds :
1-2 1-5 5-6
exact bonds :
1-16 2-3 2-10 3-4 4-5
normalized bonds :
9-10 9-14 10-11 11-12 12-13 13-14
isolated ring systems :
containing 1 : 9 :

Match level :
1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:CLASS 9:Atom 10:Atom 11:Atom 12:Atom 13:Atom 14:Atom 16:CLASS

L1 STRUCTURE UPLOADED

=> d l1
L1 HAS NO ANSWERS
L1 STR




Structure attributes must be viewed using STN Express query preparation.

```
=> s l1
SAMPLE SEARCH INITIATED 16:22:23 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED -   2641 TO ITERATE

 75.7% PROCESSED     2000 ITERATIONS                                33 ANSWERS
INCOMPLETE SEARCH (SYSTEM LIMIT EXCEEDED)
SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS:  ONLINE  **COMPLETE**
                        BATCH   **COMPLETE**
PROJECTED ITERATIONS:        49738 TO    55902
PROJECTED ANSWERS:             475 TO     1267

L2            33 SEA SSS SAM L1

=> s l1 sss full
FULL SEARCH INITIATED 16:22:29 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -  52162 TO ITERATE

100.0% PROCESSED    52162 ITERATIONS                               962 ANSWERS
SEARCH TIME: 00.00.01

L3           962 SEA SSS FUL L1

=> FIL HCAPLUS
COST IN U.S. DOLLARS                          SINCE FILE      TOTAL
                                                 ENTRY    SESSION
FULL ESTIMATED COST                             161.33     161.54

FILE 'HCAPLUS' ENTERED AT 16:22:37 ON 29 AUG 2005
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.
COPYRIGHT (C) 2005 AMERICAN CHEMICAL SOCIETY (ACS)
```

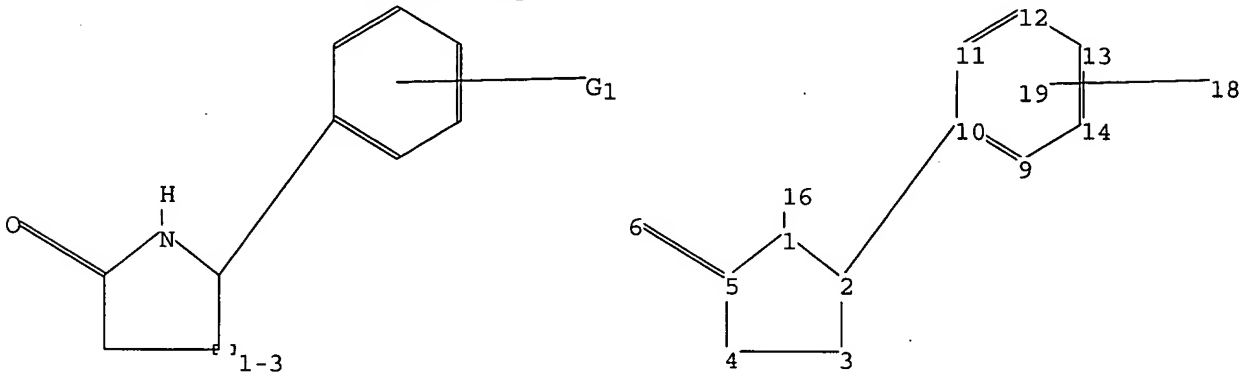
FILE COVERS 1907 - 29 Aug 2005 VOL 143 ISS 10
FILE LAST UPDATED: 28 Aug 2005 (20050828/ED)

New CAS Information Use Policies, enter HELP USAGETERMS for details.

This file contains CAS Registry Numbers for easy and accurate
substance identification.

```
=> s l3
L4          394 L3

=> s l4 and pesticides
         61855 PESTICIDES
L5           8 L4 AND PESTICIDES

=> s l4 and py<=1996
      17466452 PY<=1996
L6          286 L4 AND PY<=1996

=> s l6 and pesticides
         61855 PESTICIDES
L7             0 L6 AND PESTICIDES

=> s l6 and herbicides
         62994 HERBICIDES
L8             1 L6 AND HERBICIDES

=> s l4 and herbicides
         62994 HERBICIDES
L9             3 L4 AND HERBICIDES

=> FIL REGISTRY
COST IN U.S. DOLLARS                        SINCE FILE      TOTAL
                                              ENTRY     SESSION
FULL ESTIMATED COST                             17.15     178.69

FILE 'REGISTRY' ENTERED AT 16:26:37 ON 29 AUG 2005
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.
COPYRIGHT (C) 2005 American Chemical Society (ACS)

Property values tagged with IC are from the ZIC/VINITI data file
provided by InfoChem.

STRUCTURE FILE UPDATES:   28 AUG 2005  HIGHEST RN 861926-07-0
DICTIONARY FILE UPDATES:  28 AUG 2005  HIGHEST RN 861926-07-0

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH JULY 14, 2005

  Please note that search-term pricing does apply when
  conducting SmartSELECT searches.
```

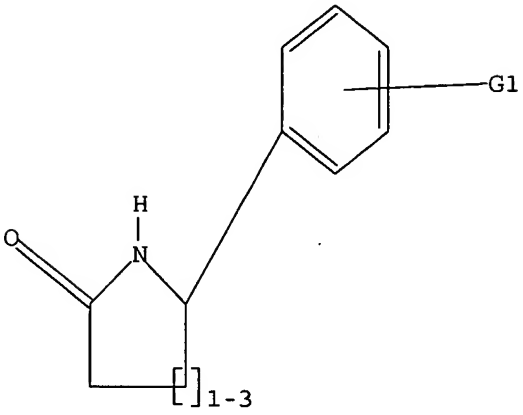
```
**********************************************************************
*                                                                    *
* The CA roles and document type information have been removed from *
* the IDE default display format and the ED field has been added,    *
* effective March 20, 2005.  A new display format, IDERL, is now     *
* available and contains the CA role and document type information.  *
*                                                                    *
**********************************************************************

Structure search iteration limits have been increased.  See HELP SLIMITS
for details.

Experimental and calculated property data are now available. For more
information enter HELP PROP at an arrow prompt in the file or refer
to the file summary sheet on the web at:
http://www.cas.org/ONLINE/DBSS/registryss.html

=>
Uploading C:\Program Files\Stnexp\Queries\10768294a.str
```




```
chain nodes :
6  16  18
ring nodes :
1  2  3  4  5  9  10  11  12  13  14
chain bonds :
1-16  2-10  5-6
ring bonds :
1-2  1-5  2-3  3-4  4-5  9-10  9-14  10-11  11-12  12-13  13-14
exact/norm bonds :
1-2  1-5  5-6
exact bonds :
1-16  2-3  2-10  3-4  4-5
normalized bonds :
9-10  9-14  10-11  11-12  12-13  13-14
isolated ring systems :
containing 1 : 9 :

G1:X,CN

Match level :
1:Atom  2:Atom  3:Atom  4:Atom  5:Atom  6:CLASS  9:Atom  10:Atom  11:Atom  12:Atom
13:Atom  14:Atom  16:CLASS  18:CLASS  19:CLASS
```

L10 STRUCTURE UPLOADED

=> d l10
L10 HAS NO ANSWERS
L10 STR




G1 X,CN

Structure attributes must be viewed using STN Express query preparation.

=> s l10
SAMPLE SEARCH INITIATED 16:26:56 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED - 6714 TO ITERATE

29.8% PROCESSED 2000 ITERATIONS 4 ANSWERS
INCOMPLETE SEARCH (SYSTEM LIMIT EXCEEDED)
SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE **COMPLETE**
BATCH **COMPLETE**
PROJECTED ITERATIONS: 129368 TO 139192
PROJECTED ANSWERS: 49 TO 487

L11 4 SEA SSS SAM L10

=> s l10 sss full
FULL SEARCH INITIATED 16:27:05 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - 132573 TO ITERATE

100.0% PROCESSED 132573 ITERATIONS 173 ANSWERS
SEARCH TIME: 00.00.03

L12 173 SEA SSS FUL L10

=> FIL HCAPLUS
COST IN U.S. DOLLARS SINCE FILE ENTRY TOTAL SESSION

FULL ESTIMATED COST 161.33 340.02

FILE 'HCAPLUS' ENTERED AT 16:27:13 ON 29 AUG 2005

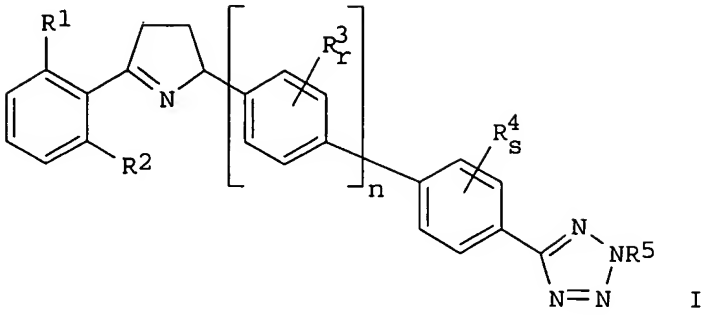
FILE COVERS 1907 - 29 Aug 2005 VOL 143 ISS 10
FILE LAST UPDATED: 28 Aug 2005 (20050828/ED)

New CAS Information Use Policies, enter HELP USAGETERMS for details.

This file contains CAS Registry Numbers for easy and accurate substance identification.

```
=> s l12
L13           60 L12

=> s l13 and py<=1996
      17466452 PY<=1996
L14           32 L13 AND PY<=1996

=> s l14 and pestcides
               2 PESTCIDES
L15            0 L14 AND PESTCIDES

=> s l14 and herbicides
           62994 HERBICIDES
L16            1 L14 AND HERBICIDES

=> d his

     (FILE 'HOME' ENTERED AT 16:21:44 ON 29 AUG 2005)

     FILE 'REGISTRY' ENTERED AT 16:22:03 ON 29 AUG 2005
L1                STRUCTURE UPLOADED
L2             33 S L1
L3            962 S L1 SSS FULL

     FILE 'HCAPLUS' ENTERED AT 16:22:37 ON 29 AUG 2005
L4            394 S L3
L5              8 S L4 AND PESTICIDES
L6            286 S L4 AND PY<=1996
L7              0 S L6 AND PESTICIDES
L8              1 S L6 AND HERBICIDES
L9              3 S L4 AND HERBICIDES

     FILE 'REGISTRY' ENTERED AT 16:26:37 ON 29 AUG 2005
L10               STRUCTURE UPLOADED
L11             4 S L10
L12           173 S L10 SSS FULL
```

```
     FILE 'HCAPLUS' ENTERED AT 16:27:13 ON 29 AUG 2005
L13          60 S L12
L14          32 S L13 AND PY<=1996
L15           0 S L14 AND PESTCIDES
L16           1 S L14 AND HERBICIDES

=> d 15 ibib abs hitstr tot

L5   ANSWER 1 OF 8  HCAPLUS  COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER:         2002:733857  HCAPLUS
DOCUMENT NUMBER:          137:263039
TITLE:                    Preparation of pyrrolyl(bi)phenyl-2H-tetrazoles as
                          pesticides
INVENTOR(S):              Plant, Andrew; Maurer, Fritz; Marhold, Albrecht;
                          Erdelen, Christoph; Turberg, Andreas; Hansen, Olaf
PATENT ASSIGNEE(S):       Bayer AG, Germany
SOURCE:                   Ger. Offen., 36 pp.
                          CODEN: GWXXBX
DOCUMENT TYPE:            Patent
LANGUAGE:                 German
FAMILY ACC. NUM. COUNT:   1
PATENT INFORMATION:

     PATENT NO.           KIND   DATE        APPLICATION NO.          DATE
     ---------------      ----   --------    --------------------     --------
     DE 10113965           A1    20020926    DE 2001-10113965         20010322
     CA 2441334            AA    20021003    CA 2002-2441334          20020312
     WO 2002076978         A1    20021003    WO 2002-EP2684           20020312
         W:  AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
             GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
             LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,
             PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ,
             UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU,
             TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH,
             CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR,
             BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
     EP 1379521            A1    20040114    EP 2002-722207           20020312
         R:  AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
             IE, SI, LT, LV, FI, RO, MK, CY, AL, TR
     BR 2002008295         A     20040413    BR 2002-8295             20020312
     CN 1509284            A     20040630    CN 2002-809773           20020312
     JP 2004529131         T2    20040924    JP 2002-576236           20020312
     US 2004152904         A1    20040805    US 2003-472270           20031212
PRIORITY APPLN. INFO.:                        DE 2001-10113965    A    20010322
                                              WO 2002-EP2684      W    20020312
OTHER SOURCE(S):          MARPAT 137:263039
GI
```

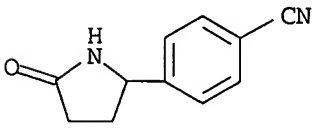


I

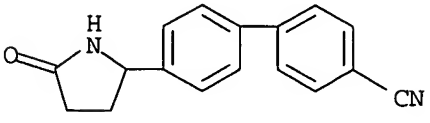
AB Title compds. [I; R1 = halo, Me; R2 = H, halo; R3, R4 = halo, (substituted) alkyl, alkoxy; R5 = H, alkylcarbonyl, (substituted) alkyl, alkylsulfonyl, cycloalkyl; n = 0, 1; r, s = 0-2], were prepared Thus, a mixture of 2-(4-bromophenyl)-5-(2,6-difluorophenyl)-3,4-dihydro-2H-pyrrole, 4,4,4',4',5,5,5',5'-octamethyl-2,2'-bi-1,3,2-dioxaborolan, KOAc, and PdCl2dppf was heated with DMF under Ar-atmospheric followed by cooling and addition of 2-ethyl-5-(4-bromophenyl)-2H-tetrazole (preparation given) to give, after 16 h stirring at 80°, 62% 5-(4'-[5-(2,6-difluorophenyl)-3,4-dihydro-2H-pyrrol-2-yl]-1,1'-biphenyl-4-yl)-2-ethyl-2H-tetrazole. The latter was said to kill of Heliothis virescens-caterpillars on Glycine max with a good efficiency.

IT **339087-31-9P 461440-97-1P 461440-98-2P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of pyrrolyl(bi)phenyl-2H-tetrazoles as **pesticides**)

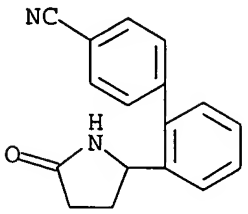
RN 339087-31-9 HCAPLUS
CN Benzonitrile, 4-(5-oxo-2-pyrrolidinyl)- (9CI) (CA INDEX NAME)



RN 461440-97-1 HCAPLUS
CN [1,1'-Biphenyl]-4-carbonitrile, 4'-(5-oxo-2-pyrrolidinyl)- (9CI) (CA INDEX NAME)



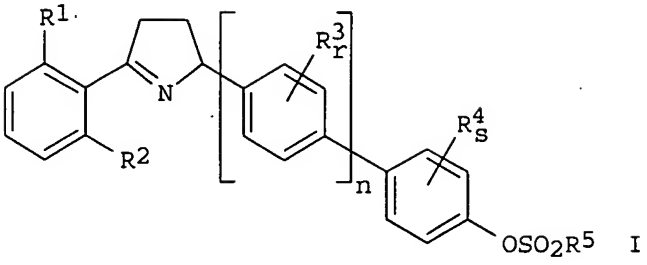
RN 461440-98-2 HCAPLUS
CN [1,1'-Biphenyl]-4-carbonitrile, 2'-(5-oxo-2-pyrrolidinyl)- (9CI) (CA INDEX NAME)



L5 ANSWER 2 OF 8 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 2002:240724 HCAPLUS
DOCUMENT NUMBER: 136:263092
TITLE: Preparation of 3,4-dihydropyrroles as **pesticides**
INVENTOR(S): Plant, Andrew; Marhold, Albrecht; Grosser, Rolf; Erdelen, Christoph; Turberg, Andreas; Hansen, Olaf
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 114 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 2002024644 | A1 | 20020328 | WO 2001-EP10430 | 20010910 |
| W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 10051395 | A1 | 20020411 | DE 2000-10051395 | 20001017 |
| AU 2001087722 | A5 | 20020402 | AU 2001-87722 | 20010910 |
| EP 1322604 | A1 | 20030702 | EP 2001-967323 | 20010910 |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR | | | | |
| BR 2001014096 | A | 20030819 | BR 2001-14096 | 20010910 |
| JP 2004509864 | T2 | 20040402 | JP 2002-529057 | 20010910 |
| US 2003220386 | A1 | 20031127 | US 2003-380728 | 20030609 |
| PRIORITY APPLN. INFO.: | | | DE 2000-10047119 A | 20000922 |
| | | | DE 2000-10051395 A | 20001017 |
| | | | WO 2001-EP10430 W | 20010910 |

OTHER SOURCE(S): MARPAT 136:263092
GI

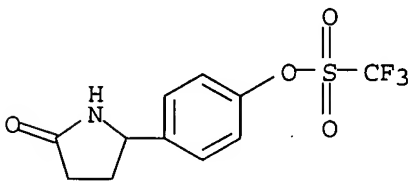


AB Title compds. [I; n = 0, 1; r, s = 0-2; R1 = halo, Me; R2 = H, halo; R3, R4 = halo, (halo)alkyl, (halo)alkoxy; R5 = (halo)alkyl, (substituted) Ph, NR6R7; R6 = (halo)alkyl; R7 = H, (halo)alkyl, R6R7 = (alkoxy)alkylene] were prepared Thus, 4-[5-(2,6-difluorophenyl)-3,4-dihydro-2H-pyrrol-2-yl]phenol in PhMe was treated with 45% NaOH and 4-(trifluoromethoxy)benzenesulfonyl chloride, followed by stirring for 12 h at 45°, to give 70% 5-(2,6-difluorophenyl)-2-(4-[4-(trifluoromethoxy)phenyl]sulfonyloxyphenyl)-3,4-dihydro-2H-pyrrole. Several I at 100-200 ppm gave 90-95% kill of Aphis gossypii on Gossypium hirsutum after 6 days.

IT **207989-88-6**
RL: RCT (Reactant); RACT (Reactant or reagent)
(preparation of dihydropyrroles as **pesticides**)

RN 207989-88-6 HCAPLUS

CN Methanesulfonic acid, trifluoro-, 4-(5-oxo-2-pyrrolidinyl)phenyl ester (9CI) (CA INDEX NAME)

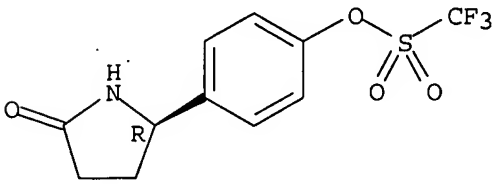


IT **405201-81-2P 405201-84-5P 405201-86-7P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of dihydropyrroles as **pesticides**)

RN 405201-81-2 HCAPLUS

CN Methanesulfonic acid, trifluoro-, 4-[(2R)-5-oxo-2-pyrrolidinyl]phenyl ester (9CI) (CA INDEX NAME)

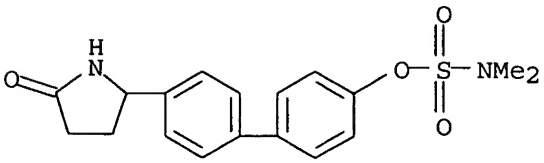
Absolute stereochemistry. Rotation (+).



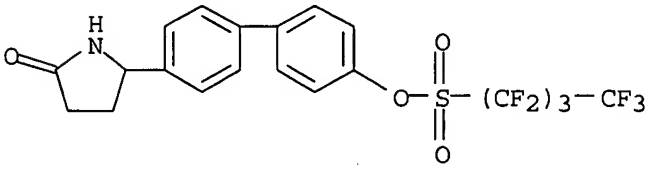
RN 405201-84-5 HCAPLUS

CN Sulfamic acid, dimethyl-, 4'-(5-oxo-2-pyrrolidinyl)[1,1'-biphenyl]-4-yl

ester (9CI) (CA INDEX NAME)



RN 405201-86-7 HCAPLUS
CN 1-Butanesulfonic acid, 1,1,2,2,3,3,4,4,4-nonafluoro-, 4'-(5-oxo-2-pyrrolidinyl)[1,1'-biphenyl]-4-yl ester (9CI) (CA INDEX NAME)



REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

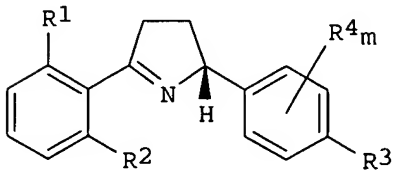
L5 ANSWER 3 OF 8 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 2002:240723 HCAPLUS
DOCUMENT NUMBER: 136:279329
TITLE: Preparation of optically active 2,5-diaryl-3,4-dihydropyrroles as **pesticides**
INVENTOR(S): Plant, Andrew; Geller, Thomas; Gallenkamp, Bernd; Grosser, Rolf; Marhold, Albrecht; Erdelen, Christoph; Turberg, Andreas; Hansen, Olaf
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 129 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 2002024643 | A1 | 20020328 | WO 2001-EP10424 | 20010910 |
| W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 10047110 | A1 | 20020418 | DE 2000-10047110 | 20000922 |
| AU 2002013897 | A5 | 20020402 | AU 2002-13897 | 20010910 |
| CA 2422958 | AA | 20030319 | CA 2001-2422958 | 20010910 |
| BR 2001014062 | A | 20030701 | BR 2001-14062 | 20010910 |

| | | | | | |
|---|---|---|---|---|---|
| EP 1322607 | A1 | 20030702 | EP 2001-982267 | | 20010910 |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR | | | | | |
| JP 2004509166 | T2 | 20040325 | JP 2002-529056 | | 20010910 |
| NZ 524813 | A | 20040924 | NZ 2001-524813 | | 20010910 |
| EG 23084 | A | 20040331 | EG 2001-997 | | 20010918 |
| US 2004059129 | A1 | 20040325 | US 2003-380433 | | 20030728 |
| PRIORITY APPLN. INFO.: | | | DE 2000-10047110 | A | 20000922 |
| | | | WO 2001-EP10424 | W | 20010910 |

OTHER SOURCE(S): MARPAT 136:279329

GI



I

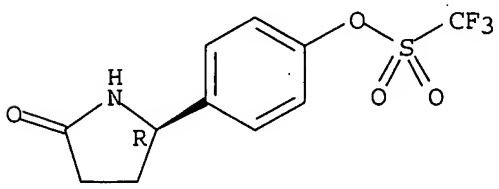
AB Title compds. [I; * = C with (R) configuration; m = 0-4; R1 = halo, Me; R2 = H, halo; R3 = H, halo, OH, (halo)alkyl, (halo)alkenyl, alkynyl, alkoxy, S(O)oR6, etc.; R4 = halo, (halo)alkyl, (halo)alkoxy, S(O)oR6; o = 0-2; R6 = H, (halo)alkyl], were prepared Thus, (+/-)-5-(2,6-difluorophenyl)-2-[4'-(trifluoromethoxy)-1,1'-biphenyl-4-yl]-3,4-dihydro-2H-pyrrole in n-heptanol/isopropanol was fractionally chromatographed with silica gel Chiralcel OD by HPLC to give 87.3% (2R)-5-(2,6-difluorophenyl)-2-[4'-(trifluoromethoxy)-1,1'-biphenyl-4-yl]-3,4-dihydro-2H-pyrrole (ee = 99.5%). The latter at 8 ppm gave 100% kill of Heliothis armigera after 6 days.

IT **405201-81-2P 405522-16-9P 405522-18-1P**
**405522-25-0P 405522-26-1P 405522-27-2P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of optically active diaryldihydropyrroles as **pesticides**)

RN 405201-81-2 HCAPLUS

CN Methanesulfonic acid, trifluoro-, 4-[(2R)-5-oxo-2-pyrrolidinyl]phenyl ester (9CI) (CA INDEX NAME)

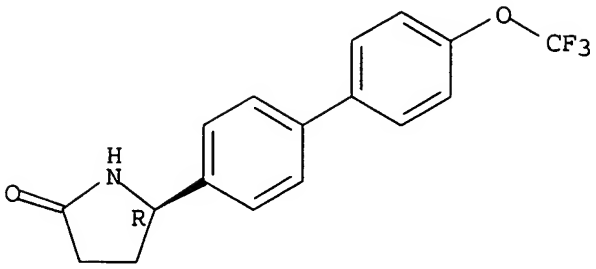
Absolute stereochemistry. Rotation (+).




RN 405522-16-9 HCAPLUS

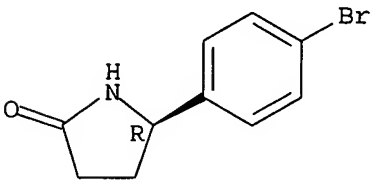
CN 2-Pyrrolidinone, 5-[4'-(trifluoromethoxy)[1,1'-biphenyl]-4-yl]-, (5R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



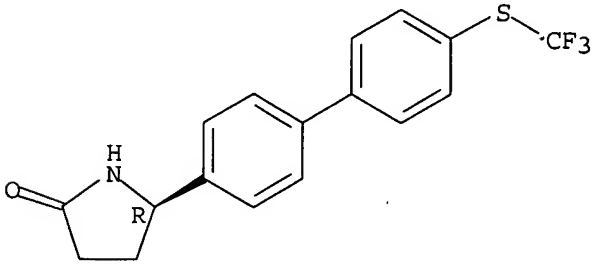
RN 405522-18-1 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-bromophenyl)-, (5R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



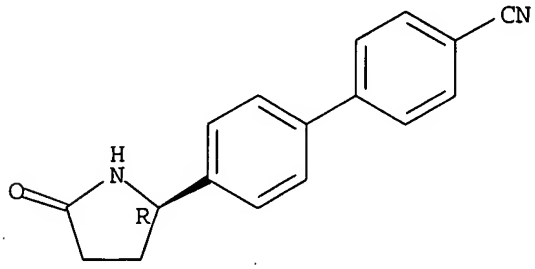
RN 405522-25-0 HCAPLUS
CN 2-Pyrrolidinone, 5-[4'-[(trifluoromethyl)thio][1,1'-biphenyl]-4-yl]-, (5R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



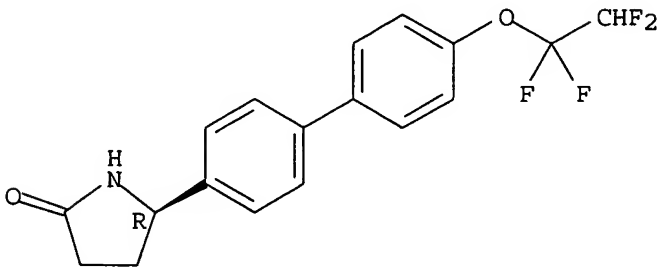
RN 405522-26-1 HCAPLUS
CN [1,1'-Biphenyl]-4-carbonitrile, 4'-[(2R)-5-oxo-2-pyrrolidinyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



RN 405522-27-2 HCAPLUS
CN 2-Pyrrolidinone, 5-[4'-(1,1,2,2-tetrafluoroethoxy)[1,1'-biphenyl]-4-yl]-, (5R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



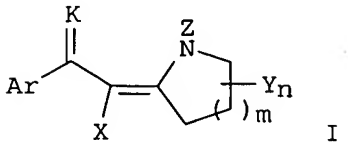

REFERENCE COUNT: 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L5 ANSWER 4 OF 8 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 2000:335381 HCAPLUS
DOCUMENT NUMBER: 132:334360
TITLE: Preparation of phenyl-substituted cyclic enaminones as herbicides and **pesticides.**
INVENTOR(S): Fischer, Reiner; Wischnat, Ralf; Drewes, Mark Wilhelm; Dollinger, Markus; Erdelen, Christoph; Feucht, Dieter; Wetcholowsky, Ingo; Wachendorff-Neumann, Ulrike; Philipp, Ulrich; Rauch, Olga-Tatjana
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 143 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 2000027812 | A1 | 20000518 | WO 1999-EP8366 | 19991102 |
| W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 19851986 | A1 | 20000518 | DE 1998-19851986 | 19981111 |
| CA 2350305 | AA | 20000518 | CA 1999-2350305 | 19991102 |
| BR 9915260 | A | 20010807 | BR 1999-15260 | 19991102 |
| EP 1129071 | A1 | 20010905 | EP 1999-955944 | 19991102 |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO | | | | |
| JP 2002529450 | T2 | 20020910 | JP 2000-580992 | 19991102 |
| AU 770205 | B2 | 20040219 | AU 2000-12688 | 19991102 |
| US 6455472 | B1 | 20020924 | US 2001-831261 | 20010716 |
| US 2003130125 | A1 | 20030710 | US 2002-206426 | 20020726 |

PRIORITY APPLN. INFO.: DE 1998-19851986 A 19981111
DE 1998-19851985 A 19981111
WO 1999-EP8366 W 19991102
US 2001-831261 A3 20010716

OTHER SOURCE(S): MARPAT 132:334360
GI

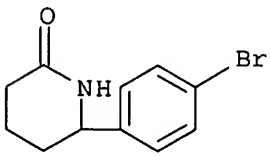


I

AB Title compds. [I; K = O, S; Ar = (substituted) Ph, naphthyl, mono- or bicyclic heteroaryl; X = cyano, CONR1R2, CSNH2; Y = halo, (substituted) alkyl, alkoxy, Ph, phenylalkyl, heteroaryl, CO2R1, CONR1R2, etc.; Z = H, (substituted) alkyl, alkenyl, alkynyl, cycloalkyl, cycloalkylalkyl, alkoxyalkyl, phenoxyalkyl, phenylthioalkyl, etc.; R1 = H, (substituted) (unsatd.) (heteroatom-interrupted) alkyl, cycloalkyl, Ph, heteroaryl; R2 = H, (substituted) (unsatd.) alkyl, alkoxy, Ph, phenylalkyl, phenylalkoxy; m = 1-3; n = 0-4], were prepared Thus, 2-ethoxypyrroline and 4-chlorobenzoylacetonitrile were heated in PhMe with azeotropic removal of EtOH to give 74% 3-(4-chlorophenyl)-3-oxo-2-pyrrolidin-2-ylidenepropionitrile. Several I were active against Phaedon cochleariae on cabbage leaves.

IT **267880-78-4**
RL: RCT (Reactant); RACT (Reactant or reagent)
(preparation of phenyl-substituted cyclic enaminones as herbicides and **pesticides**)

RN 267880-78-4 HCAPLUS
CN 2-Piperidinone, 6-(4-bromophenyl)- (9CI) (CA INDEX NAME)



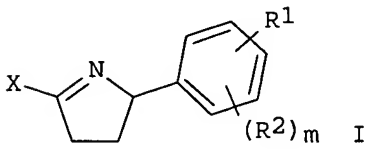
REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L5 ANSWER 5 OF 8 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 2000:260281 HCAPLUS
DOCUMENT NUMBER: 132:279107
TITLE: Preparation of 5-aryl-2-heteroaryl-3,4-dihydro-2H-pyrroles as **pesticides**.
INVENTOR(S): Plant, Andrew; Alig, Bernd; Graff, Alan; Kraatz, Udo; Kramer, Wolfgang; Erdelen, Christoph; Turberg, Andreas; Mencke, Norbert
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 239 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German

FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 2000021958 | A1 | 20000420 | WO 1999-EP7295 | 19991001 |
| W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 19847076 | A1 | 20000420 | DE 1998-19847076 | 19981014 |
| AU 9961988 | A1 | 20000501 | AU 1999-61988 | 19991001 |
| AU 761113 | B2 | 20030529 | | |
| EP 1121357 | A1 | 20010808 | EP 1999-948915 | 19991001 |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO | | | | |
| BR 9915544 | A | 20010814 | BR 1999-15544 | 19991001 |
| JP 2002527437 | T2 | 20020827 | JP 2000-575864 | 19991001 |
| US 6599924 | B1 | 20030729 | US 2001-807136 | 20010405 |
| PRIORITY APPLN. INFO.: | | | DE 1998-19847076 A | 19981014 |
| | | | WO 1999-EP7295 W | 19991001 |

OTHER SOURCE(S): MARPAT 132:279107
GI



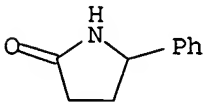

I

AB Title compds. [I; X = (substituted) 5-10 membered mono- or bicyclic heterocyclyl; R1 = halo, XA, BZD, YE; m = 0-4; R2 = H, halo, cyano, NO2, alkyl, alkoxy, haloalkyl, haloalkoxy, alkoxyalkoxy, SR3, SOR3, SO2R3; R3 = alkyl, haloalkyl; X = bond, O, S, CO, CO2, etc.; A = (substituted) Ph, naphthyl, tetrahydronaphthyl, 5-10 membered heterocyclyl; B = (substituted) p-phenylene; Z = O, S; D = H, alkyl, alkenyl, alkynyl, haloalkyl, haloalkenyl, (substituted) cycloalkyl, cycloalkenyl, phenylalkyl, etc.; ZD = (substituted) phenoxyalkyl; Y = bond, O, S, CO, CO2, alkylene, alkenylene, alkynylene, etc.; E = H, alkyl, alkenyl, alkynyl, haloalkyl, haloalkenyl, (substituted) cycloalkenyl, Ph, 5-6 membered heteroaryl], were prepared Thus, furan in THF at -30° was treated with BuLi and then with a solution of N-tert-butoxycarbonyl-γ-(4'-trifluoromethoxybiphen-4-yl)-γ-butyrolactam (preparation given) in THF followed by 2 h stirring at -20° and stirring overnight at room temperature to give 86% BOC-protected aminoketone, which was stirred overnight with CF3CO2H to give 86% 2-(2-furyl)-5-(4'-trifluoromethoxybiphen-4-yl)-3,4-dihydro-2H-pyrrole. Tested I at 0.1% on bean plants gave ≥95% kill of organophosphate-resistant Tetranychus urticae.

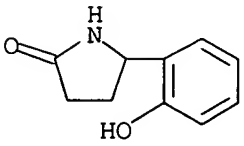
IT **22050-10-8P 25097-93-2P 207989-87-5P**
**207989-88-6P 207989-89-7P 207989-90-0P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT

(Reactant or reagent)
(preparation of 5-aryl-2-heteroaryl-3,4-dihydro-2H-pyrroles as **pesticides**)

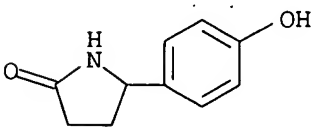
RN 22050-10-8 HCAPLUS
CN 2-Pyrrolidinone, 5-phenyl- (8CI, 9CI) (CA INDEX NAME)



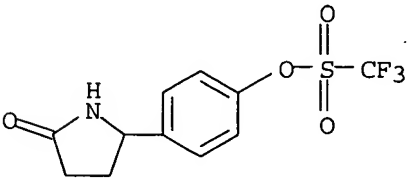
RN 25097-93-2 HCAPLUS
CN 2-Pyrrolidinone, 5-(2-hydroxyphenyl)- (9CI) (CA INDEX NAME)



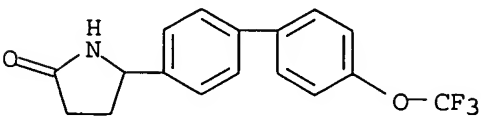
RN 207989-87-5 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-hydroxyphenyl)- (9CI) (CA INDEX NAME)



RN 207989-88-6 HCAPLUS
CN Methanesulfonic acid, trifluoro-, 4-(5-oxo-2-pyrrolidinyl)phenyl ester (9CI) (CA INDEX NAME)

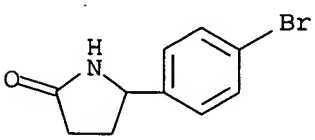


RN 207989-89-7 HCAPLUS
CN 2-Pyrrolidinone, 5-[4'-(trifluoromethoxy)[1,1'-biphenyl]-4-yl]- (9CI) (CA INDEX NAME)



RN 207989-90-0 HCAPLUS

CN 2-Pyrrolidinone, 5-(4-bromophenyl)- (9CI) (CA INDEX NAME)

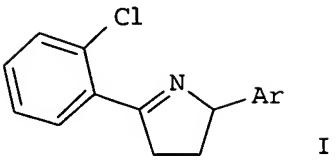


REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L5 ANSWER 6 OF 8 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1999:753208 HCAPLUS
DOCUMENT NUMBER: 131:351232
TITLE: Preparation of 5-aryl-2-(2-chlorophenyl)-3,4-dihydro-2H-pyrroles as **pesticides.**
INVENTOR(S): Plant, Andrew; Graff, Alan; Kraatz, Udo; Erdelen, Christoph; Turberg, Andreas; Mencke, Norbert
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: PCT Int. Appl., 159 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | | DATE |
|---|---|---|---|---|---|
| WO 9959968 | A1 | 19991125 | WO 1999-EP3063 | | 19990505 |
| W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | | |
| RW: GH, GM, KE, LS, MW, SD, SL, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG | | | | | |
| DE 19822247 | A1 | 19991125 | DE 1998-19822247 | | 19980518 |
| CA 2332723 | AA | 19991125 | CA 1999-2332723 | | 19990505 |
| AU 9941384 | A1 | 19991206 | AU 1999-41384 | | 19990505 |
| AU 747396 | B2 | 20020516 | | | |
| BR 9910539 | A | 20010116 | BR 1999-10539 | | 19990505 |
| TR 200003389 | T2 | 20010221 | TR 2000-200003389 | | 19990505 |
| EP 1080072 | A1 | 20010307 | EP 1999-924878 | | 19990505 |
| EP 1080072 | B1 | 20040804 | | | |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, NL, SE, PT, IE, FI | | | | | |
| JP 2002515483 | T2 | 20020528 | JP 2000-549587 | | 19990505 |
| AT 272622 | E | 20040815 | AT 1999-924878 | | 19990505 |
| ES 2224666 | T3 | 20050301 | ES 1999-924878 | | 19990505 |
| US 6489490 | B1 | 20021203 | US 2000-700289 | | 20001113 |
| PRIORITY APPLN. INFO.: | | | DE 1998-19822247 | A | 19980518 |
| | | | WO 1999-EP3063 | W | 19990505 |

OTHER SOURCE(S): MARPAT 131:351232
GI

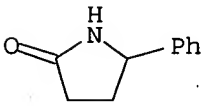


I

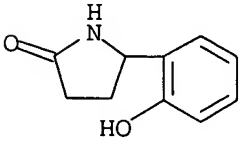
AB Title compds. (I; Ar = substituted Ph), were prepared Thus, 2-(2-chlorophenyl)-5-(4-bromophenyl)-3,4-dihydro-2H-pyrrole (preparation given) was stirred with 4-trifluoromethoxyphenylboronic acid, K2CO3, and Pd(PPh3)2Cl2 in dimethoxyethane/H2O to give 11.2% 2-(2-chlorophenyl)-5-(4-trifluoromethoxy-4,4'-biphenyl-1-yl)-3,4-dihydro-2H-pyrrole. The latter at 0.004% on soybeans gave 100% kill of Heliothis armigera.

IT **22050-10-8P 25097-93-2P 207989-87-5P 207989-88-6P 207989-89-7P 207989-90-0P 250671-49-9P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of 5-aryl-2-(2-chlorophenyl)-3,4-dihydro-2H-pyrroles as **pesticides**)

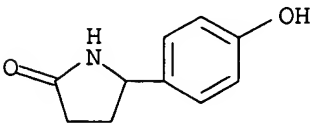
RN 22050-10-8 HCAPLUS
CN 2-Pyrrolidinone, 5-phenyl- (8CI, 9CI) (CA INDEX NAME)



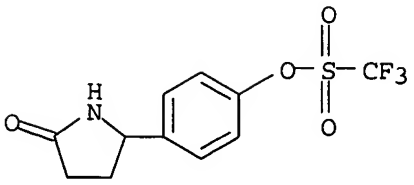
RN 25097-93-2 HCAPLUS
CN 2-Pyrrolidinone, 5-(2-hydroxyphenyl)- (9CI) (CA INDEX NAME)



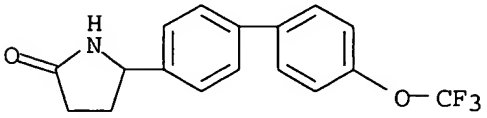
RN 207989-87-5 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-hydroxyphenyl)- (9CI) (CA INDEX NAME)



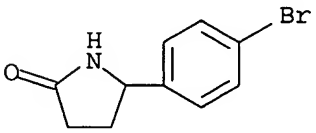
RN 207989-88-6 HCAPLUS
CN Methanesulfonic acid, trifluoro-, 4-(5-oxo-2-pyrrolidinyl)phenyl ester (9CI) (CA INDEX NAME)



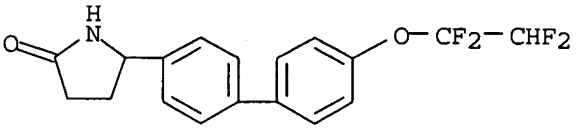
RN 207989-89-7 HCAPLUS
CN 2-Pyrrolidinone, 5-[4'-(trifluoromethoxy)[1,1'-biphenyl]-4-yl]- (9CI) (CA INDEX NAME)



RN 207989-90-0 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-bromophenyl)- (9CI) (CA INDEX NAME)



RN 250671-49-9 HCAPLUS
CN 2-Pyrrolidinone, 5-[4'-(1,1,2,2-tetrafluoroethoxy)[1,1'-biphenyl]-4-yl]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

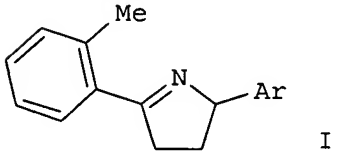
L5 ANSWER 7 OF 8 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1999:753207 HCAPLUS
DOCUMENT NUMBER: 131:351231
TITLE: Preparation of 2-(2-methylphenyl)-5-aryl-3,4-dihydro-2H-pyrroles as **pesticides.**
INVENTOR(S): Plant, Andrew; Backhaus, Dirk; Erdelen, Christoph; Turberg, Andreas; Mencke, Norbert
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: PCT Int. Appl., 146 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 9959967 | A1 | 19991125 | WO 1999-EP3062 | 19990505 |
| W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, SD, SL, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 19822245 | A1 | 19991125 | DE 1998-19822245 | 19980518 |
| CA 2332522 | AA | 19991125 | CA 1999-2332522 | 19990505 |
| AU 9940369 | A1 | 19991206 | AU 1999-40369 | 19990505 |
| AU 742032 | B2 | 20011213 | | |
| BR 9910540 | A | 20010130 | BR 1999-10540 | 19990505 |
| EP 1077938 | A1 | 20010228 | EP 1999-923526 | 19990505 |
| EP 1077938 | B1 | 20050413 | | |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, NL, SE, PT, IE, FI | | | | |
| TR 200003390 | T2 | 20010321 | TR 2000-200003390 | 19990505 |
| JP 2002515482 | T2 | 20020528 | JP 2000-549586 | 19990505 |
| AT 293099 | E | 20050415 | AT 1999-923526 | 19990505 |
| US 6632833 | B1 | 20031014 | US 2000-700288 | 20001113 |
| PRIORITY APPLN. INFO.: | | | DE 1998-19822245 A | 19980518 |
| | | | WO 1999-EP3062 W | 19990505 |

OTHER SOURCE(S): MARPAT 131:351231

GI



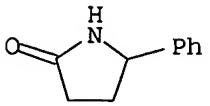

I

AB Title compds. [I; Ar = (substituted) Ph], were prepared Thus, 1-tert-butoxycarbonylamino-1-[4'-trifluoromethoxybiphenyl-4-yl]-3-[O-methylbenzoyl]propane (preparation given) in CH2Cl2 was treated with CF3CO2H to give 93.1% 2-(2-methylphenyl)-5-[4'-trifluoromethoxybiphen-4-yl]-3,4-dihydro-2H-pyrrole. The latter at 0.004% on cabbage leaves gave 100% kill of Plutella xylostella after 6 days.

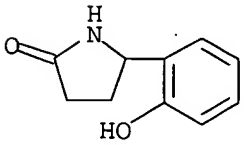
IT **22050-10-8P 25097-93-2P 207989-87-5P 207989-88-6P 207989-89-7P 207989-90-0P 250671-49-9P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of 2-(2-methylphenyl)-5-aryl-3,4-dihydro-2H-pyrroles as **pesticides**)

RN 22050-10-8 HCAPLUS

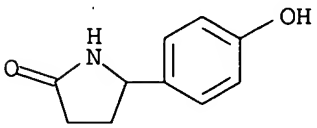
CN 2-Pyrrolidinone, 5-phenyl- (8CI, 9CI) (CA INDEX NAME)



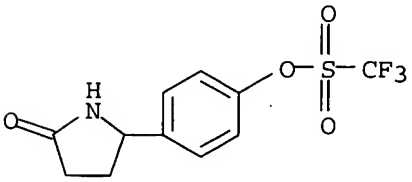
RN 25097-93-2 HCAPLUS
CN 2-Pyrrolidinone, 5-(2-hydroxyphenyl)- (9CI) (CA INDEX NAME)



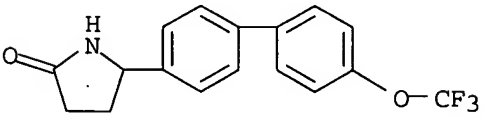
RN 207989-87-5 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-hydroxyphenyl)- (9CI) (CA INDEX NAME)



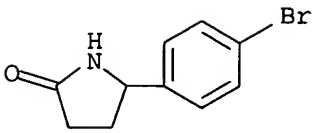
RN 207989-88-6 HCAPLUS
CN Methanesulfonic acid, trifluoro-, 4-(5-oxo-2-pyrrolidinyl)phenyl ester (9CI) (CA INDEX NAME)



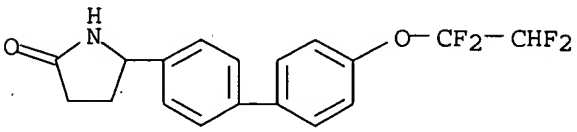
RN 207989-89-7 HCAPLUS
CN 2-Pyrrolidinone, 5-[4'-(trifluoromethoxy)[1,1'-biphenyl]-4-yl]- (9CI) (CA INDEX NAME)



RN 207989-90-0 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-bromophenyl)- (9CI) (CA INDEX NAME)



RN 250671-49-9 HCAPLUS
CN 2-Pyrrolidinone, 5-[4'-(1,1,2,2-tetrafluoroethoxy)[1,1'-biphenyl]-4-yl]-
(9CI) (CA INDEX NAME)



REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L5 ANSWER 8 OF 8 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1998:352816 HCAPLUS
DOCUMENT NUMBER: 129:27884
TITLE: Preparation of aryl-substituted cyclic imines as **pesticides.**
INVENTOR(S): Plant, Andrew; Kleefeld, Gerd; Potter, Thorsten; Erdelen, Christoph; Mencke, Norbert; Turberg, Andreas; Wachendorff-Neumann, Ulrike
PATENT ASSIGNEE(S): Bayer A.-G., Germany; Plant, Andrew; Kleefeld, Gerd; Potter, Thorsten; Erdelen, Christoph; Mencke, Norbert; Turberg, Andreas; Wachendorff-Neumann, Ulrike
SOURCE: PCT Int. Appl., 128 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 9822438 | A1 | 19980528 | WO 1997-EP6186 | 19971107 |
| W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GH, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG | | | | |
| DE 19648011 | A1 | 19980528 | DE 1996-19648011 | 19961120 |
| AU 9853197 | A1 | 19980610 | AU 1998-53197 | 19971107 |
| AU 737059 | B2 | 20010809 | | |
| EP 942901 | A1 | 19990922 | EP 1997-950138 | 19971107 |
| EP 942901 | B1 | 20030305 | | |
| R: BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT | | | | |
| CN 1244860 | A | 20000216 | CN 1997-181458 | 19971107 |

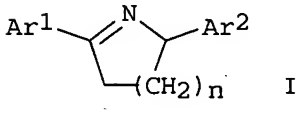
| | | | | |
|---|---|---|---|---|
| BR 9713520 | A | 20000321 | BR 1997-13520 | 19971107 |
| NZ 335798 | A | 20001027 | NZ 1997-335798 | 19971107 |
| JP 2001506592 | T2 | 20010522 | JP 1998-523151 | 19971107 |
| EP 1306371 | A1 | 20030502 | EP 2003-371 | 19971107 |
| R: BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT | | | | |
| PT 942901 | T | 20030731 | PT 1997-950138 | 19971107 |
| ES 2190803 | T3 | 20030816 | ES 1997-950138 | 19971107 |
| IL 129857 | A1 | 20040219 | IL 1997-129857 | 19971107 |
| TW 572730 | B | 20040121 | TW 1997-86117105 | 19971117 |
| KR 2000053185 | A | 20000825 | KR 1999-704146 | 19990510 |
| US 6274613 | B1 | 20010814 | US 1999-297964 | 19990511 |
| US 6399771 | B1 | 20020604 | US 2000-659041 | 20000909 |
| US 2002151571 | A1 | 20021017 | US 2001-28648 | 20011219 |
| US 6770595 | B2 | 20040803 | | |
| US 2004186287 | A1 | 20040923 | US 2004-768294 | 20040130 |

PRIORITY APPLN. INFO.:

| | |
|---|---|
| DE 1996-19648011 | A 19961120 |
| EP 1997-950138 | A3 19971107 |
| WO 1997-EP6186 | W 19971107 |
| US 1999-297964 | A3 19990511 |
| US 2000-659041 | A3 20000909 |
| US 2001-28648 | A3 20011219 |

OTHER SOURCE(S): MARPAT 129:27884

GI

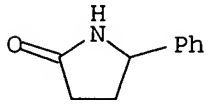


I

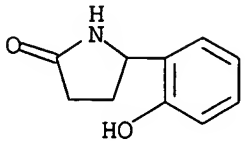
AB Title compds. (I; Ar1, Ar2 = (substituted) Ph; n = 1, 2, 3), were prepared Thus, 1-tert-butoxycarbonylamino-3-(2,6-difluorobenzoyl)-1-phenylpropane (preparation given) was treated with CF3CO2H at 0° to room temperature to give 83% 2-(2,6-difluorophenyl)-5-phenyl-3,4-dihydro-2H-pyrrole. The latter at 0.1% gave 90% kill of Myzus persicae on cabbage leaves.

IT **22050-10-8P 25097-93-2P 207989-87-5P**
**207989-88-6P 207989-89-7P 207989-90-0P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of aryl-substituted cyclic imines as **pesticides**)

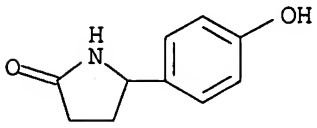
RN 22050-10-8 HCAPLUS
CN 2-Pyrrolidinone, 5-phenyl- (8CI, 9CI) (CA INDEX NAME)



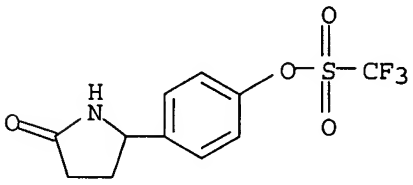
RN 25097-93-2 HCAPLUS
CN 2-Pyrrolidinone, 5-(2-hydroxyphenyl)- (9CI) (CA INDEX NAME)



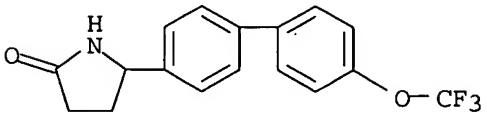
RN 207989-87-5 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-hydroxyphenyl)- (9CI) (CA INDEX NAME)



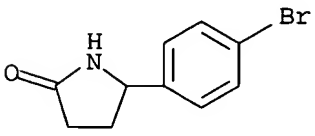
RN 207989-88-6 HCAPLUS
CN Methanesulfonic acid, trifluoro-, 4-(5-oxo-2-pyrrolidinyl)phenyl ester (9CI) (CA INDEX NAME)



RN 207989-89-7 HCAPLUS
CN 2-Pyrrolidinone, 5-[4'-(trifluoromethoxy)[1,1'-biphenyl]-4-yl]- (9CI) (CA INDEX NAME)



RN 207989-90-0 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-bromophenyl)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 8 THERE ARE 8 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

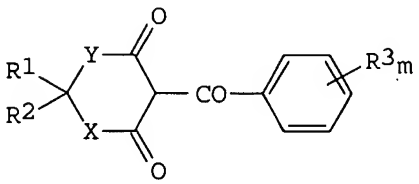
=> d 18 ibib abs hitstr tot

L8 ANSWER 1 OF 1 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1989:38898 HCAPLUS
DOCUMENT NUMBER: 110:38898
TITLE: Preparation of benzoylpiperidinediones and other cyclic diones as **herbicides**
INVENTOR(S): Geach, Neil Jonathan; Gilmour, James; Hatton, Leslie Roy; Smith, Philip Henry Gaunt
PATENT ASSIGNEE(S): May and Baker Ltd., UK
SOURCE: Eur. Pat. Appl., 31 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| EP 278742 | A2 | 19880817 | EP 1988-301103 | 19880210 <-- |
| EP 278742 | A3 | 19891115 | | |
| R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE | | | | |
| FI 8800591 | A | 19880812 | FI 1988-591 | 19880209 <-- |
| AU 8811454 | A1 | 19880818 | AU 1988-11454 | 19880209 <-- |
| AU 607183 | B2 | 19910228 | | |
| ZA 8800911 | A | 19900131 | ZA 1988-911 | 19880209 <-- |
| DK 8800680 | A | 19880812 | DK 1988-680 | 19880210 <-- |
| JP 63203644 | A2 | 19880823 | JP 1988-29989 | 19880210 <-- |
| HU 48092 | A2 | 19890529 | HU 1988-607 | 19880210 <-- |
| HU 203941 | B | 19911128 | | |
| CS 273340 | B2 | 19910312 | CS 1988-839 | 19880210 <-- |
| RO 100664 | B1 | 19921120 | RO 1988-132128 | 19880210 <-- |
| BR 8800580 | A | 19880927 | BR 1988-580 | 19880211 <-- |
| DD 282005 | A5 | 19900829 | DD 1988-312844 | 19880211 <-- |
| US 5114461 | A | 19920519 | US 1989-440208 | 19891122 <-- |
| AU 9066910 | A1 | 19910627 | AU 1990-66910 | 19901123 <-- |

PRIORITY APPLN. INFO.: GB 1987-3068 A 19870211
GB 1987-7608 A 19870331
US 1988-154031 B1 19880209

OTHER SOURCE(S): MARPAT 110:38898
GI



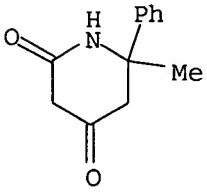
I

AB Title compds. I [X = CH2, O, S, R4N; R4 = H, C1-6 alkyl, C2-7 alkoxycarbonyl; Y = CH2, O, R5R6N; R5 = H, C1-6 alkyl, C2-7 alkoxycarbonyl; R6 = H, C1-6 alkyl; R1 = H; (un)substituted C1-6 alkyl, C3-6 cycloalkyl; R2 = H, R1R2 = C2-6 alkylene, etc.; R3 = halo, HO, H2OC, O2N, cyano, H2N, [(un)substituted C1-6 alkyl]carbamoyl, etc.; m = 0-5], or an agriculturally acceptable salt thereof, were prepared 2,4-(O2N)ClC6H3COCl in CH2Cl2 was added at 5-10° to 6,6-dimethylpiperidine-2,4-dione and Et3N in CH2Cl2, the mixture stirred at ambient temperature for 18 h, Et3N and Me2COHCN were added successively, and the

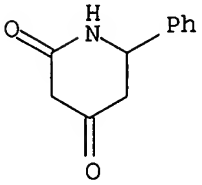
mixture stirred at ambient temperature to give I (R1, R2 = Me; R3m = 2-NO2, 4-Cl; X = NH; Y = CH2) (II). In preemergence test, II at 2000 g/ha gave 100% control of Chenopodium album.

IT **118263-98-2 118264-04-3**
RL: RCT (Reactant); RACT (Reactant or reagent)
(benzoylation of)

RN 118263-98-2 HCAPLUS
CN 2,4-Piperidinedione, 6-methyl-6-phenyl- (9CI) (CA INDEX NAME)

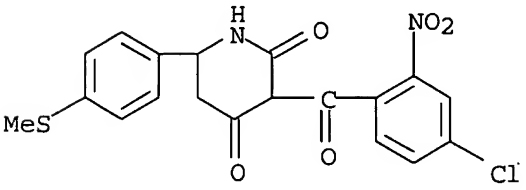


RN 118264-04-3 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl- (9CI) (CA INDEX NAME)



IT **118263-49-3**
RL: RCT (Reactant); RACT (Reactant or reagent)
(oxidation of)

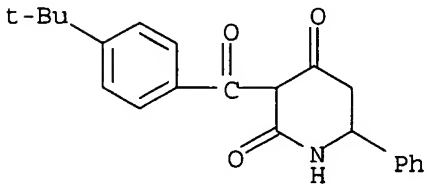
RN 118263-49-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-[4-(methylthio)phenyl]- (9CI) (CA INDEX NAME)



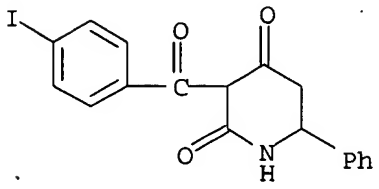
IT **118262-34-3P 118262-35-4P 118262-36-5P**
**118262-37-6P 118262-38-7P 118262-40-1P**
**118262-41-2P 118262-42-3P 118262-43-4P**
**118262-44-5P 118262-45-6P 118262-46-7P**
**118262-47-8P 118262-48-9P 118262-49-0P**
**118262-50-3P 118262-51-4P 118262-52-5P**
**118262-53-6P 118262-54-7P 118262-55-8P**
**118262-56-9P 118262-57-0P 118262-58-1P**
**118262-59-2P 118262-60-5P 118262-62-7P**

**118262-77-4P 118262-78-5P 118263-48-2P**
**118263-49-3P 118263-50-6P 118263-51-7P**
**118263-52-8P 118263-61-9P 118263-62-0P**
**118263-63-1P 118263-64-2P 118263-65-3P**
**118263-66-4P 118263-67-5P 118263-68-6P**
**118263-69-7P 118263-70-0P 118263-71-1P**
**118264-33-8P 118272-20-1P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(preparation of, as herbicide)

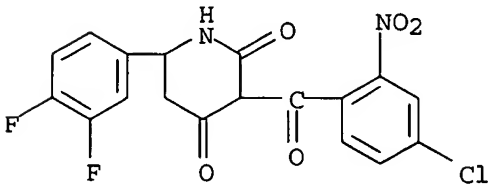
RN 118262-34-3 HCAPLUS
CN 2,4-Piperidinedione, 3-[4-(1,1-dimethylethyl)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



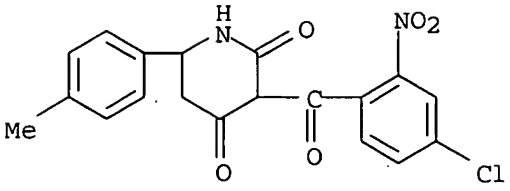

RN 118262-35-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-iodobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



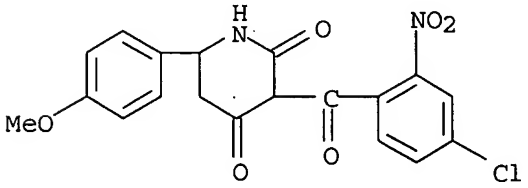

RN 118262-36-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(3,4-difluorophenyl)- (9CI) (CA INDEX NAME)



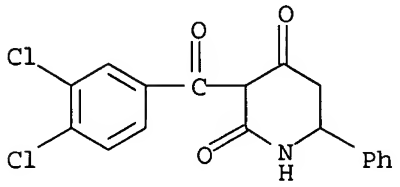

RN 118262-37-6 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(4-methylphenyl)- (9CI) (CA INDEX NAME)



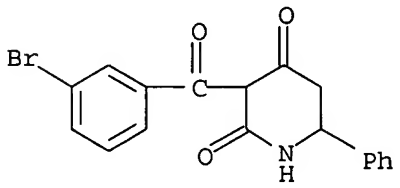
RN 118262-38-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(4-methoxyphenyl)- (9CI) (CA INDEX NAME)



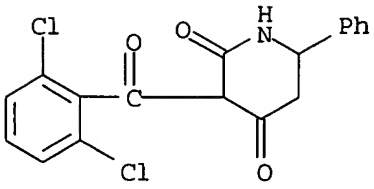
RN 118262-40-1 HCAPLUS
CN 2,4-Piperidinedione, 3-(3,4-dichlorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



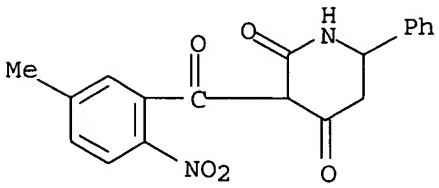
RN 118262-41-2 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-bromobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



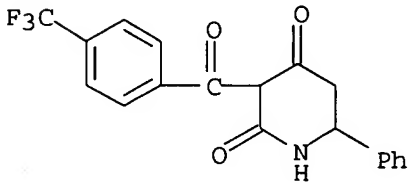
RN 118262-42-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(2,6-dichlorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



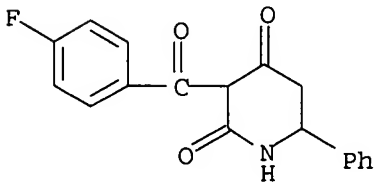
RN 118262-43-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(5-methyl-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



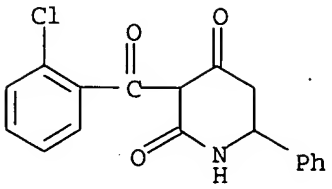
RN 118262-44-5 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[4-(trifluoromethyl)benzoyl]- (9CI) (CA INDEX NAME)



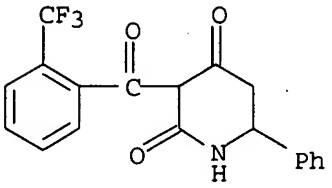
RN 118262-45-6 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-fluorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



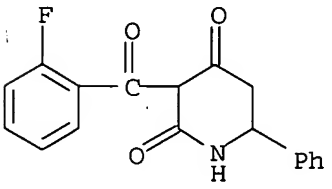
RN 118262-46-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-chlorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



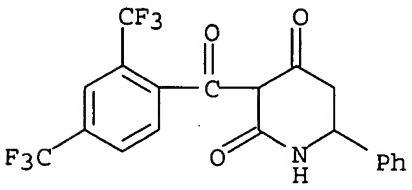
RN 118262-47-8 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[2-(trifluoromethyl)benzoyl]- (9CI) (CA INDEX NAME)



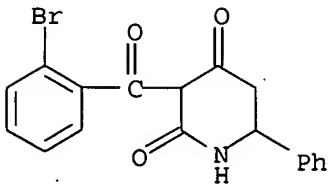
RN 118262-48-9 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-fluorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



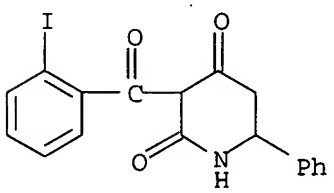
RN 118262-49-0 HCAPLUS
CN 2,4-Piperidinedione, 3-[2,4-bis(trifluoromethyl)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



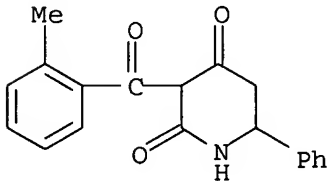
RN 118262-50-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-bromobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



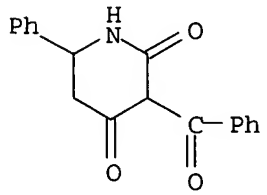
RN 118262-51-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-iodobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



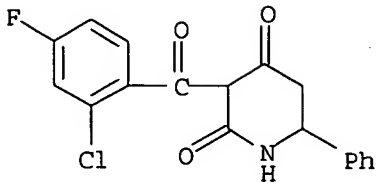
RN 118262-52-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-methylbenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



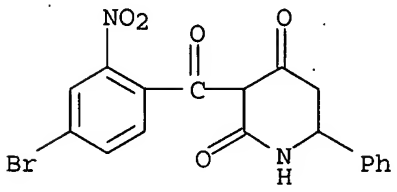
RN 118262-53-6 HCAPLUS
CN 2,4-Piperidinedione, 3-benzoyl-6-phenyl- (9CI) (CA INDEX NAME)



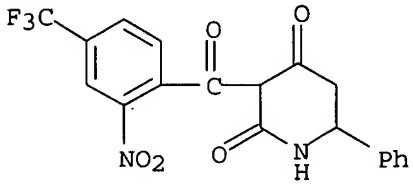
RN 118262-54-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-chloro-4-fluorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



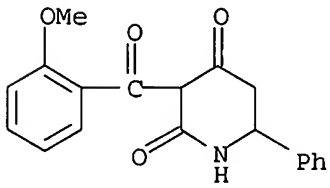
RN 118262-55-8 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-bromo-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



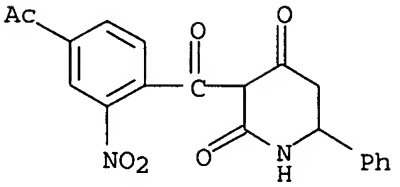
RN 118262-56-9 HCAPLUS
CN 2,4-Piperidinedione, 3-[2-nitro-4-(trifluoromethyl)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



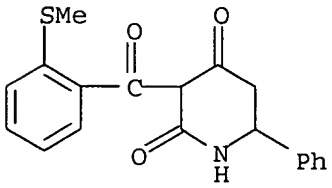
RN 118262-57-0 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-methoxybenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



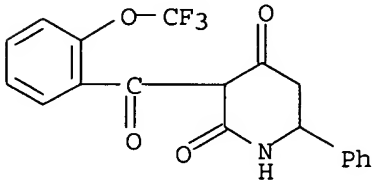
RN 118262-58-1 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-acetyl-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



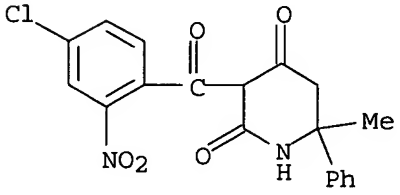
RN 118262-59-2 HCAPLUS
CN 2,4-Piperidinedione, 3-[2-(methylthio)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



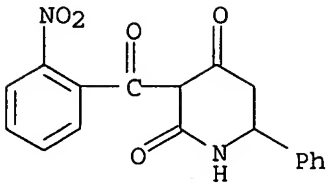
RN 118262-60-5 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[2-(trifluoromethoxy)benzoyl]- (9CI) (CA INDEX NAME)



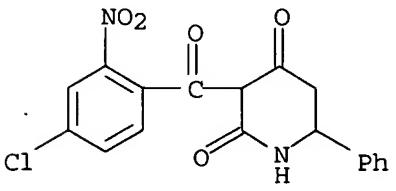
RN 118262-62-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-methyl-6-phenyl- (9CI) (CA INDEX NAME)



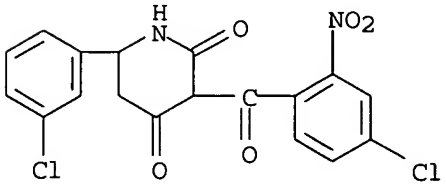
RN 118262-77-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



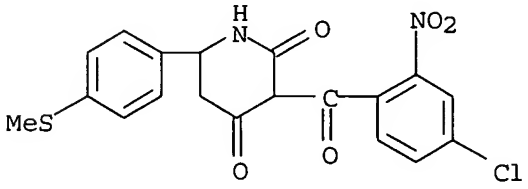
RN 118262-78-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



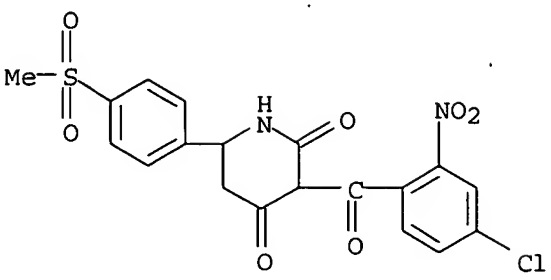
RN 118263-48-2 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(3-chlorophenyl)- (9CI) (CA INDEX NAME)



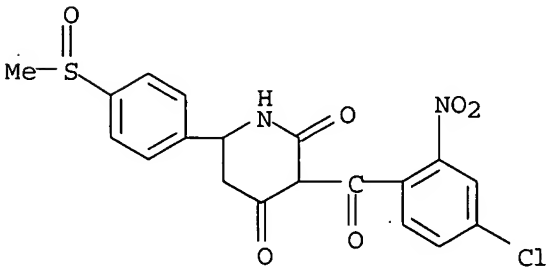
RN 118263-49-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-[4-(methylthio)phenyl]- (9CI) (CA INDEX NAME)



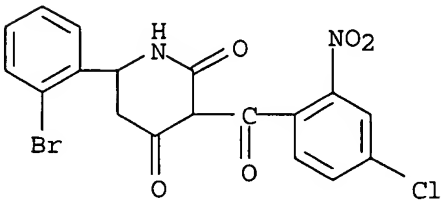
RN 118263-50-6 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-[4-(methylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)



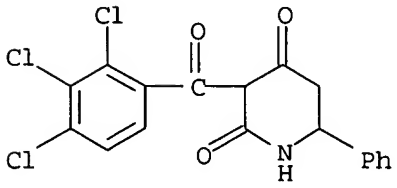
RN 118263-51-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-[4-(methylsulfinyl)phenyl]- (9CI) (CA INDEX NAME)



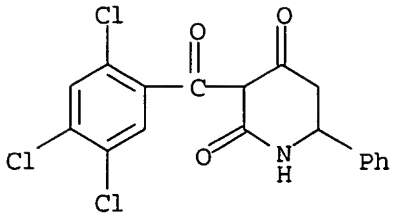
RN 118263-52-8 HCAPLUS
CN 2,4-Piperidinedione, 6-(2-bromophenyl)-3-(4-chloro-2-nitrobenzoyl)- (9CI) (CA INDEX NAME)



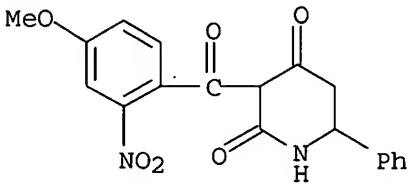
RN 118263-61-9 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-(2,3,4-trichlorobenzoyl)- (9CI) (CA INDEX NAME)



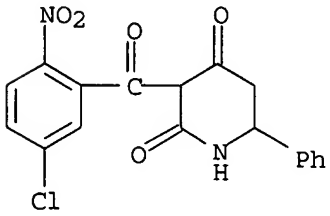
RN 118263-62-0 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-(2,4,5-trichlorobenzoyl)- (9CI) (CA INDEX NAME)



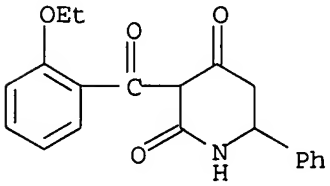
RN 118263-63-1 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-methoxy-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



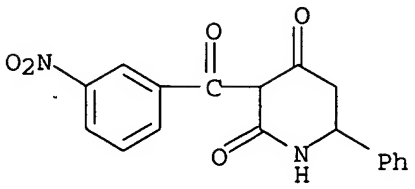
RN 118263-64-2 HCAPLUS
CN 2,4-Piperidinedione, 3-(5-chloro-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



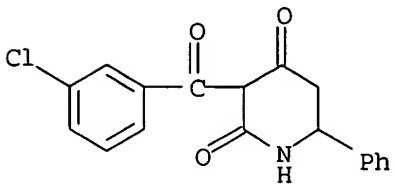
RN 118263-65-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-ethoxybenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



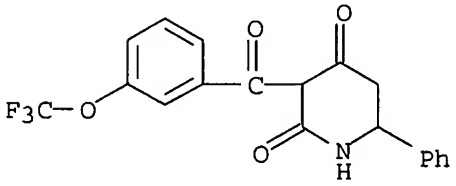
RN 118263-66-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



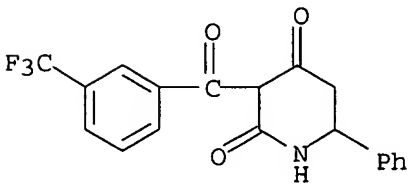
RN 118263-67-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-chlorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



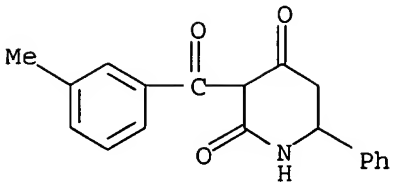
RN 118263-68-6 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[3-(trifluoromethoxy)benzoyl]- (9CI) (CA INDEX NAME)



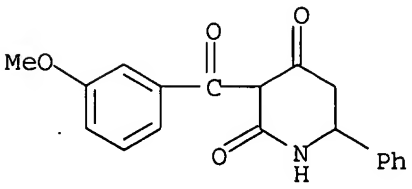
RN 118263-69-7 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[3-(trifluoromethyl)benzoyl]- (9CI) (CA INDEX NAME)



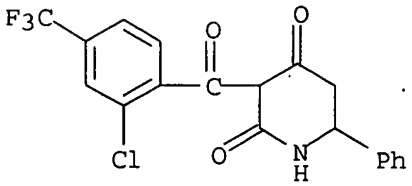
RN 118263-70-0 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-methylbenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



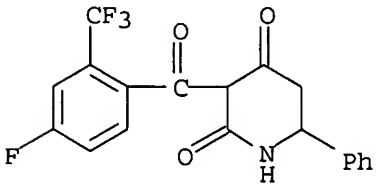
RN 118263-71-1 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-methoxybenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



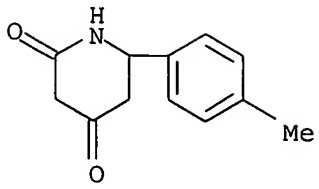
RN 118264-33-8 HCAPLUS
CN 2,4-Piperidinedione, 3-[2-chloro-4-(trifluoromethyl)benzoyl]-6-phenyl-
(9CI) (CA INDEX NAME)



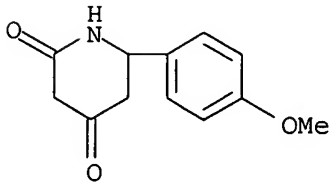
RN 118272-20-1 HCAPLUS
CN 2,4-Piperidinedione, 3-[4-fluoro-2-(trifluoromethyl)benzoyl]-6-phenyl-
(9CI) (CA INDEX NAME)



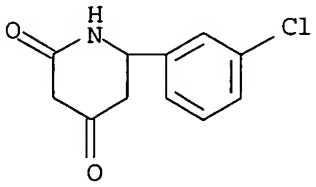
IT **118263-72-2P 118263-73-3P 118263-74-4P**
**118263-75-5P 118263-76-6P 118263-93-7P**
**118263-98-2P 118264-04-3P 118281-17-7P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of, for benzoylpiperidinedione **herbicides**)
RN 118263-72-2 HCAPLUS
CN 2,4-Piperidinedione, 6-(4-methylphenyl)- (9CI) (CA INDEX NAME)



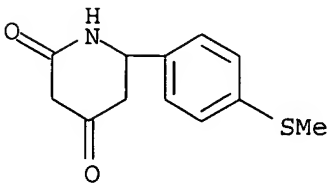
RN 118263-73-3 HCAPLUS
CN 2,4-Piperidinedione, 6-(4-methoxyphenyl)- (9CI) (CA INDEX NAME)



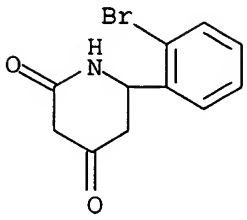
RN 118263-74-4 HCAPLUS
CN 2,4-Piperidinedione, 6-(3-chlorophenyl)- (9CI) (CA INDEX NAME)



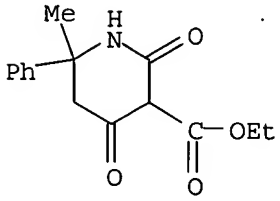
RN 118263-75-5 HCAPLUS
CN 2,4-Piperidinedione, 6-[4-(methylthio)phenyl]- (9CI) (CA INDEX NAME)



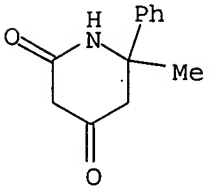
RN 118263-76-6 HCAPLUS
CN 2,4-Piperidinedione, 6-(2-bromophenyl)- (9CI) (CA INDEX NAME)



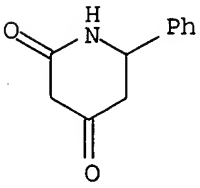
RN 118263-93-7 HCAPLUS
CN 3-Piperidinecarboxylic acid, 6-methyl-2,4-dioxo-6-phenyl-, ethyl ester (9CI) (CA INDEX NAME)



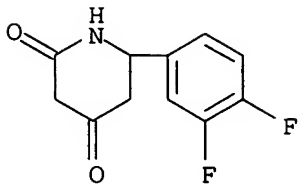
RN 118263-98-2 HCAPLUS
CN 2,4-Piperidinedione, 6-methyl-6-phenyl- (9CI) (CA INDEX NAME)



RN 118264-04-3 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl- (9CI) (CA INDEX NAME)



RN 118281-17-7 HCAPLUS
CN 2,4-Piperidinedione, 6-(3,4-difluorophenyl)- (9CI) (CA INDEX NAME)



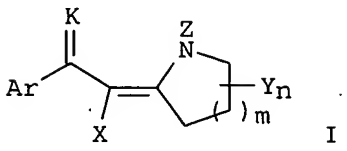
=> d l9 ibib abs hitstr tot

L9 ANSWER 1 OF 3 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 2000:335381 HCAPLUS
DOCUMENT NUMBER: 132:334360
TITLE: Preparation of phenyl-substituted cyclic enaminones as **herbicides** and pesticides.
INVENTOR(S): Fischer, Reiner; Wischnat, Ralf; Drewes, Mark Wilhelm; Dollinger, Markus; Erdelen, Christoph; Feucht, Dieter; Wetcholowsky, Ingo; Wachendorff-Neumann, Ulrike; Philipp, Ulrich; Rauch, Olga-Tatjana
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 143 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 2000027812 | A1 | 20000518 | WO 1999-EP8366 | 19991102 |
| W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 19851986 | A1 | 20000518 | DE 1998-19851986 | 19981111 |
| CA 2350305 | AA | 20000518 | CA 1999-2350305 | 19991102 |
| BR 9915260 | A | 20010807 | BR 1999-15260 | 19991102 |
| EP 1129071 | A1 | 20010905 | EP 1999-955944 | 19991102 |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO | | | | |
| JP 2002529450 | T2 | 20020910 | JP 2000-580992 | 19991102 |
| AU 770205 | B2 | 20040219 | AU 2000-12688 | 19991102 |
| US 6455472 | B1 | 20020924 | US 2001-831261 | 20010716 |
| US 2003130125 | A1 | 20030710 | US 2002-206426 | 20020726 |

| | | | |
|---|---|---|---|
| PRIORITY APPLN. INFO.: | DE 1998-19851986 | A | 19981111 |
| | DE 1998-19851985 | A | 19981111 |
| | WO 1999-EP8366 | W | 19991102 |
| | US 2001-831261 | A3 | 20010716 |

OTHER SOURCE(S): MARPAT 132:334360
GI



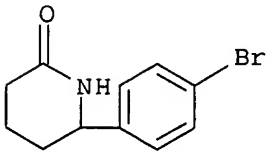
I

AB Title compds. [I; K = O, S; Ar = (substituted) Ph, naphthyl, mono- or bicyclic heteroaryl; X = cyano, CONR1R2, CSNH2; Y = halo, (substituted) alkyl, alkoxy, Ph, phenylalkyl, heteroaryl, CO2R1, CONR1R2, etc.; Z = H, (substituted) alkyl, alkenyl, alkynyl, cycloalkyl, cycloalkylalkyl, alkoxyalkyl, phenoxyalkyl, phenylthioalkyl, etc.; R1 = H, (substituted) (unsatd.) (heteroatom-interrupted) alkyl, cycloalkyl, Ph, heteroaryl; R2 = H, (substituted) (unsatd.) alkyl, alkoxy, Ph, phenylalkyl, phenylalkoxy; m = 1-3; n = 0-4], were prepared Thus, 2-ethoxypyrroline and 4-chlorobenzoylacetonitrile were heated in PhMe with azeotropic removal of EtOH to give 74% 3-(4-chlorophenyl)-3-oxo-2-pyrrolidin-2-ylidenepropionitrile. Several I were active against Phaedon cochleariae on cabbage leaves.

IT **267880-78-4**
RL: RCT (Reactant); RACT (Reactant or reagent)
(preparation of phenyl-substituted cyclic enaminones as **herbicides** and pesticides)

RN 267880-78-4 HCAPLUS

CN 2-Piperidinone, 6-(4-bromophenyl)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 2 OF 3 HCAPLUS COPYRIGHT 2005 ACS on STN

ACCESSION NUMBER: 2000:149991 HCAPLUS

DOCUMENT NUMBER: 132:275433

TITLE: Monoclonal-Based ELISA for the Identification of Herbicidal Cyclohexanedione Analogues That Inhibit Graminaceous Acetyl Coenzyme-A Carboxylase

AUTHOR(S): Webb, Steve R.; Hall, J. Christopher

CORPORATE SOURCE: Dow AgroSciences Canada Inc., Saskatoon, SK, S7N 3R2, Can.

SOURCE: Journal of Agricultural and Food Chemistry (2000), 48(4), 1210-1218
CODEN: JAFCAU; ISSN: 0021-8561

PUBLISHER: American Chemical Society

DOCUMENT TYPE: Journal

LANGUAGE: English

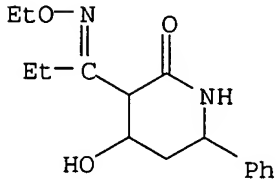
AB Cyclohexanediones are one of 4 known structural classes of **herbicides** that inhibit graminaceous acetyl coenzyme-A carboxylase

(ACCase; EC 6.4.1.2). Five monoclonal antibodies were raised against cyclohexanediones conjugated to bovine serum albumin. Cross-reactivity studies using a homologous competitive indirect ELISA (ciELISA) against 24 cyclohexanedione analogs revealed that two monoclonal antibodies (mAb A and mAb B) could segregate the analogs into active and inactive ACCase inhibitors on the basis of the analog concentration required to inhibit 50% of antibody binding to the coating conjugate (IC50). Both mAb A and mAb B were also found to cross-react with various members of the indolizidinedione structural class of ACCase inhibitors in ciELISA, suggesting that both cyclohexanediones and indolizidinediones possess features recognized by monoclonal antibodies important for the inhibition of ACCase activity. Pharmacophore-specific antibodies may be potentially valuable screening tools for the identification of new lead chemistries in a pesticide discovery program.

IT **264131-31-9**
RL: AGR (Agricultural use); PRP (Properties); BIOL (Biological study); USES (Uses)
(ELISA-identified potential herbicidal graminaceous acetyl coenzyme-A carboxylase inhibiting activity of cyclohexanedione analogs)

RN 264131-31-9 HCAPLUS

CN 2-Piperidinone, 3-[1-(ethoxyimino)propyl]-4-hydroxy-6-phenyl- (9CI) (CA INDEX NAME)



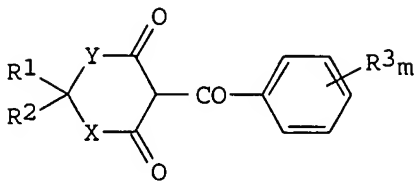

REFERENCE COUNT: 25 THERE ARE 25 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 3 OF 3 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1989:38898 HCAPLUS
DOCUMENT NUMBER: 110:38898
TITLE: Preparation of benzoylpiperidinediones and other cyclic diones as **herbicides**
INVENTOR(S): Geach, Neil Jonathan; Gilmour, James; Hatton, Leslie Roy; Smith, Philip Henry Gaunt
PATENT ASSIGNEE(S): May and Baker Ltd., UK
SOURCE: Eur. Pat. Appl., 31 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| EP 278742 | A2 | 19880817 | EP 1988-301103 | 19880210 |
| EP 278742 | A3 | 19891115 | | |
| R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE | | | | |
| FI 8800591 | A | 19880812 | FI 1988-591 | 19880209 |
| AU 8811454 | A1 | 19880818 | AU 1988-11454 | 19880209 |
| AU 607183 | B2 | 19910228 | | |
| ZA 8800911 | A | 19900131 | ZA 1988-911 | 19880209 |

| | | | | | |
|---|---|---|---|---|---|
| DK 8800680 | A | 19880812 | DK 1988-680 | | 19880210 |
| JP 63203644 | A2 | 19880823 | JP 1988-29989 | | 19880210 |
| HU 48092 | A2 | 19890529 | HU 1988-607 | | 19880210 |
| HU 203941 | B | 19911128 | | | |
| CS 273340 | B2 | 19910312 | CS 1988-839 | | 19880210 |
| RO 100664 | B1 | 19921120 | RO 1988-132128 | | 19880210 |
| BR 8800580 | A | 19880927 | BR 1988-580 | | 19880211 |
| DD 282005 | A5 | 19900829 | DD 1988-312844 | | 19880211 |
| US 5114461 | A | 19920519 | US 1989-440208 | | 19891122 |
| AU 9066910 | A1 | 19910627 | AU 1990-66910 | | 19901123 |
| PRIORITY APPLN. INFO.: | | | GB 1987-3068 | A | 19870211 |
| | | | GB 1987-7608 | A | 19870331 |
| | | | US 1988-154031 | B1 | 19880209 |

OTHER SOURCE(S): MARPAT 110:38898
GI

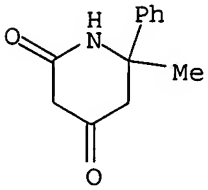


I

AB Title compds. I [X = CH2, O, S, R4N; R4 = H, C1-6 alkyl, C2-7 alkoxycarbonyl; Y = CH2, O, R5R6N; R5 = H, C1-6 alkyl, C2-7 alkoxycarbonyl; R6 = H, C1-6 alkyl; R1 = H; (un)substituted C1-6 alkyl, C3-6 cycloalkyl; R2 = H, R1R2 = C2-6 alkylene, etc.; R3 = halo, HO, H2OC, O2N, cyano, H2N, [(un)substituted C1-6 alkyl]carbamoyl, etc.; m = 0-5], or an agriculturally acceptable salt thereof, were prepared 2,4-(O2N)ClC6H3COCl in CH2Cl2 was added at 5-10° to 6,6-dimethylpiperidine-2,4-dione and Et3N in CH2Cl2, the mixture stirred at ambient temperature for 18 h, Et3N and Me2COHCN were added successively, and the mixture stirred at ambient temperature to give I (R1, R2 = Me; R3m = 2-NO2, 4-Cl; X = NH; Y = CH2) (II). In preemergence test, II at 2000 g/ha gave 100% control of Chenopodium album.

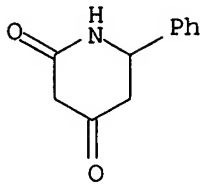
IT **118263-98-2 118264-04-3**
RL: RCT (Reactant); RACT (Reactant or reagent)
(benzoylation of)

RN 118263-98-2 HCAPLUS
CN 2,4-Piperidinedione, 6-methyl-6-phenyl- (9CI) (CA INDEX NAME)

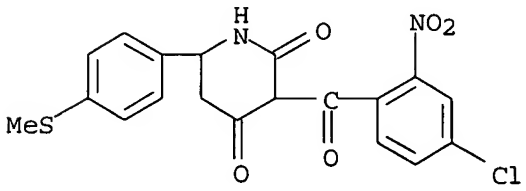


RN 118264-04-3 HCAPLUS

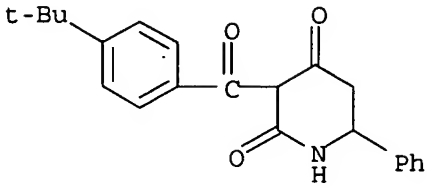
CN 2,4-Piperidinedione, 6-phenyl- (9CI) (CA INDEX NAME)



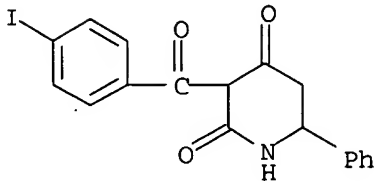
IT **118263-49-3**
RL: RCT (Reactant); RACT (Reactant or reagent)
(oxidation of)
RN 118263-49-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-[4-(methylthio)phenyl]-
(9CI) (CA INDEX NAME)



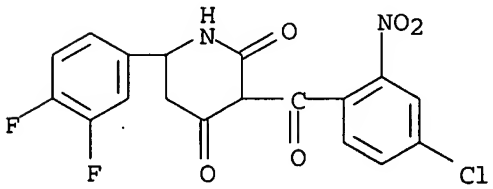
IT **118262-34-3P 118262-35-4P 118262-36-5P**
**118262-37-6P 118262-38-7P 118262-40-1P**
**118262-41-2P 118262-42-3P 118262-43-4P**
**118262-44-5P 118262-45-6P 118262-46-7P**
**118262-47-8P 118262-48-9P 118262-49-0P**
**118262-50-3P 118262-51-4P 118262-52-5P**
**118262-53-6P 118262-54-7P 118262-55-8P**
**118262-56-9P 118262-57-0P 118262-58-1P**
**118262-59-2P 118262-60-5P 118262-62-7P**
**118262-77-4P 118262-78-5P 118263-48-2P**
**118263-49-3P 118263-50-6P 118263-51-7P**
**118263-52-8P 118263-61-9P 118263-62-0P**
**118263-63-1P 118263-64-2P 118263-65-3P**
**118263-66-4P 118263-67-5P 118263-68-6P**
**118263-69-7P 118263-70-0P 118263-71-1P**
**118264-33-8P 118272-20-1P**
RL: AGR (Agricultural use); BAC (Biological activity or effector, except
adverse); BSU (Biological study, unclassified); SPN (Synthetic
preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(preparation of, as herbicide)
RN 118262-34-3 HCAPLUS
CN 2,4-Piperidinedione, 3-[4-(1,1-dimethylethyl)benzoyl]-6-phenyl- (9CI) (CA
INDEX NAME)



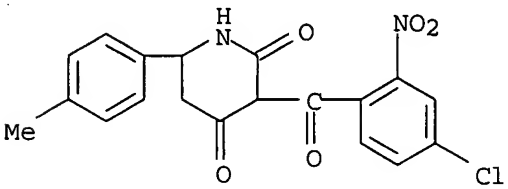
RN 118262-35-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-iodobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



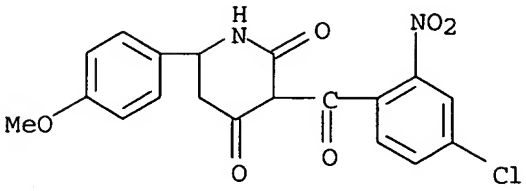
RN 118262-36-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(3,4-difluorophenyl)-
(9CI) (CA INDEX NAME)



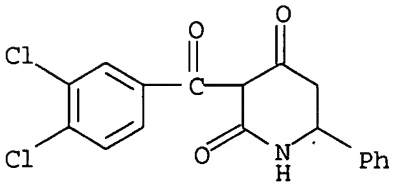
RN 118262-37-6 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(4-methylphenyl)- (9CI)
(CA INDEX NAME)



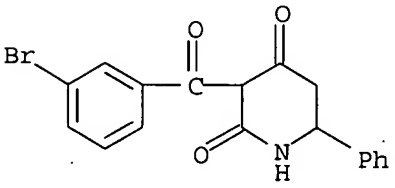
RN 118262-38-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(4-methoxyphenyl)-
(9CI) (CA INDEX NAME)



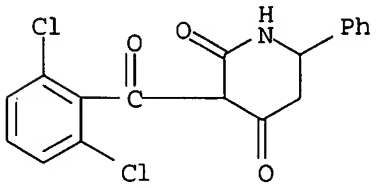
RN 118262-40-1 HCAPLUS
CN 2,4-Piperidinedione, 3-(3,4-dichlorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



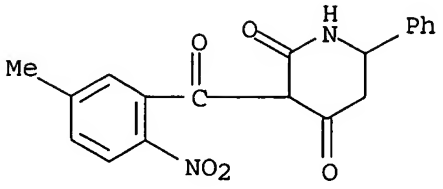
RN 118262-41-2 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-bromobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



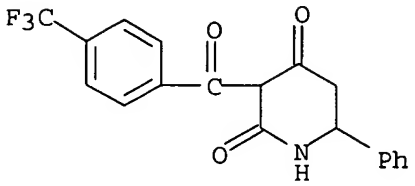
RN 118262-42-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(2,6-dichlorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



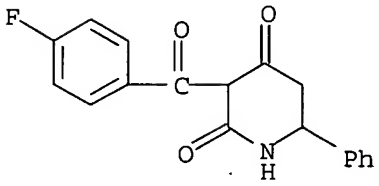
RN 118262-43-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(5-methyl-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



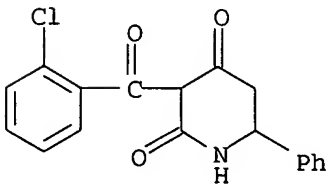
RN 118262-44-5 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[4-(trifluoromethyl)benzoyl]- (9CI) (CA INDEX NAME)



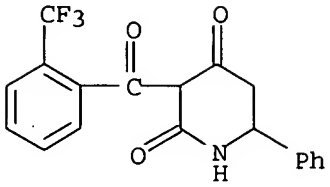
RN 118262-45-6 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-fluorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



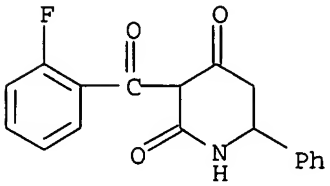
RN 118262-46-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-chlorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



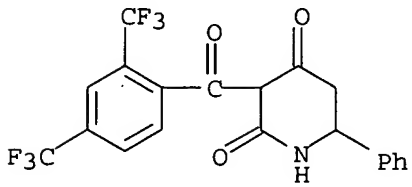
RN 118262-47-8 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[2-(trifluoromethyl)benzoyl]- (9CI) (CA INDEX NAME)



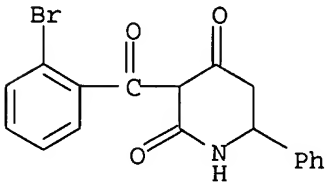
RN 118262-48-9 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-fluorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



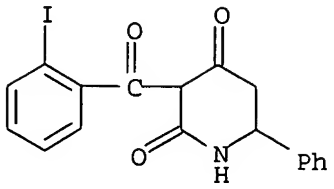
RN 118262-49-0 HCAPLUS
CN 2,4-Piperidinedione, 3-[2,4-bis(trifluoromethyl)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



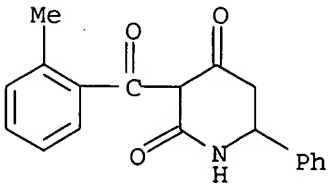
RN 118262-50-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-bromobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



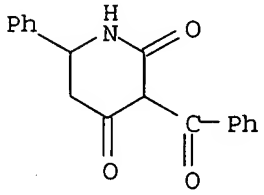
RN 118262-51-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-iodobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



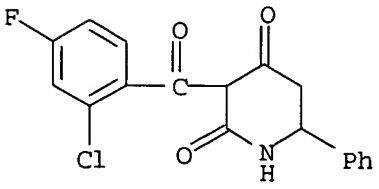
RN 118262-52-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-methylbenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



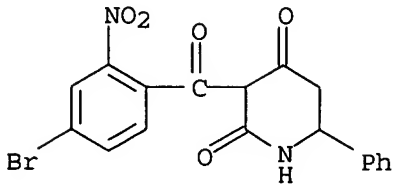
RN 118262-53-6 HCAPLUS
CN 2,4-Piperidinedione, 3-benzoyl-6-phenyl- (9CI) (CA INDEX NAME)



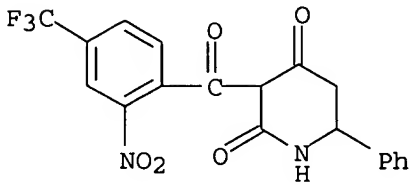
RN 118262-54-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-chloro-4-fluorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



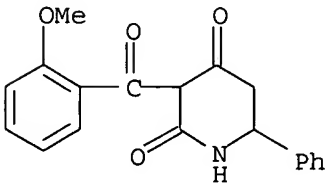
RN 118262-55-8 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-bromo-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



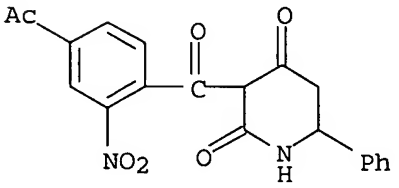
RN 118262-56-9 HCAPLUS
CN 2,4-Piperidinedione, 3-[2-nitro-4-(trifluoromethyl)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



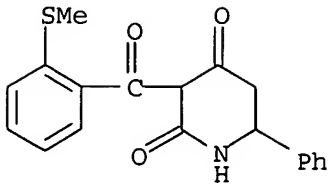
RN 118262-57-0 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-methoxybenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



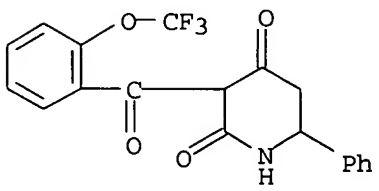
RN 118262-58-1 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-acetyl-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



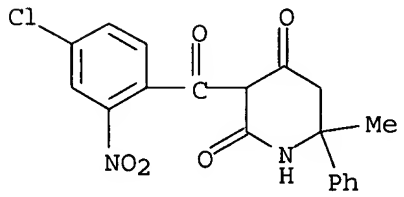
RN 118262-59-2 HCAPLUS
CN 2,4-Piperidinedione, 3-[2-(methylthio)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



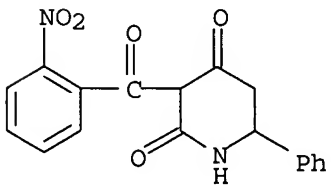
RN 118262-60-5 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[2-(trifluoromethoxy)benzoyl]- (9CI) (CA INDEX NAME)



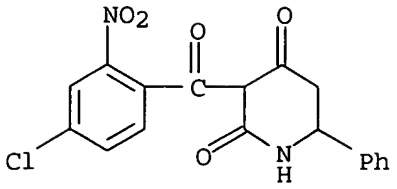
RN 118262-62-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-methyl-6-phenyl- (9CI) (CA INDEX NAME)



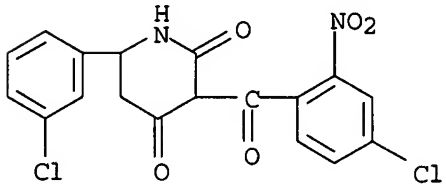
RN 118262-77-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



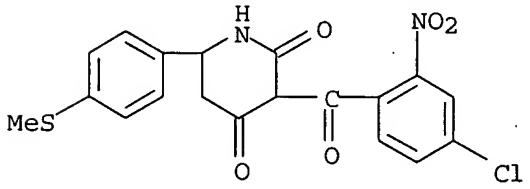
RN 118262-78-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



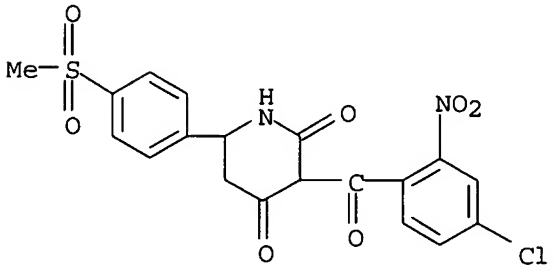
RN 118263-48-2 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(3-chlorophenyl)- (9CI) (CA INDEX NAME)



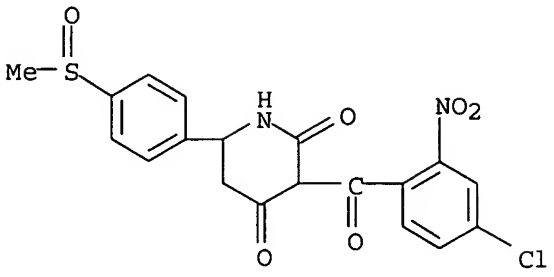
RN 118263-49-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-[4-(methylthio)phenyl]- (9CI) (CA INDEX NAME)



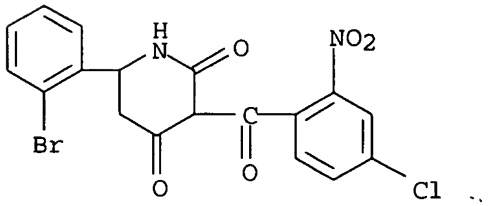
RN 118263-50-6 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-[4-(methylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)



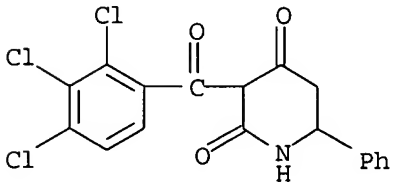
RN 118263-51-7 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-[4-(methylsulfinyl)phenyl]- (9CI) (CA INDEX NAME)



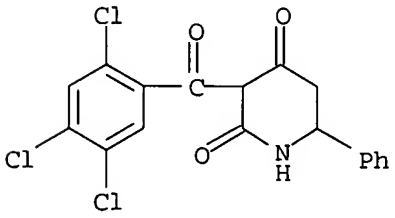
RN 118263-52-8 HCAPLUS
CN 2,4-Piperidinedione, 6-(2-bromophenyl)-3-(4-chloro-2-nitrobenzoyl)- (9CI) (CA INDEX NAME)



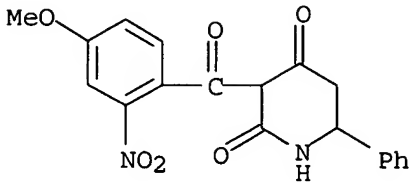
RN 118263-61-9 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-(2,3,4-trichlorobenzoyl)- (9CI) (CA INDEX NAME)



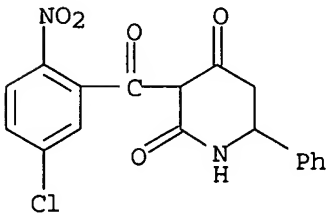
RN 118263-62-0 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-(2,4,5-trichlorobenzoyl)- (9CI) (CA INDEX NAME)



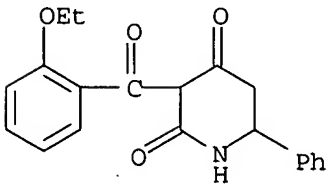
RN 118263-63-1 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-methoxy-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



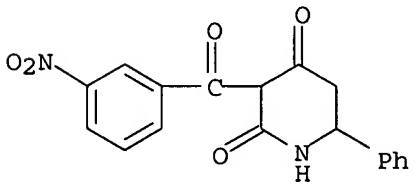
RN 118263-64-2 HCAPLUS
CN 2,4-Piperidinedione, 3-(5-chloro-2-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



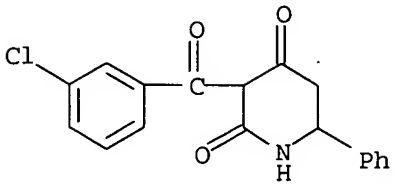
RN 118263-65-3 HCAPLUS
CN 2,4-Piperidinedione, 3-(2-ethoxybenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



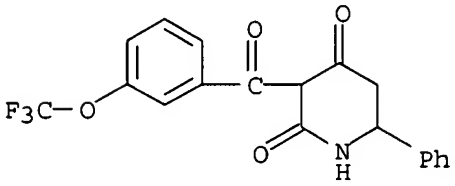
RN 118263-66-4 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-nitrobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



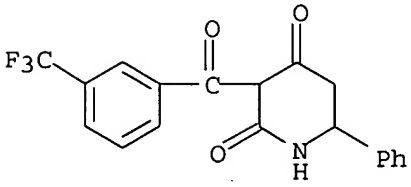
RN 118263-67-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-chlorobenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



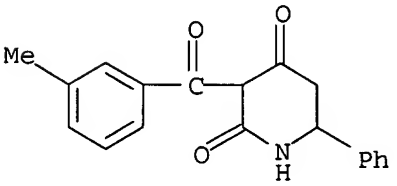
RN 118263-68-6 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[3-(trifluoromethoxy)benzoyl]- (9CI) (CA INDEX NAME)



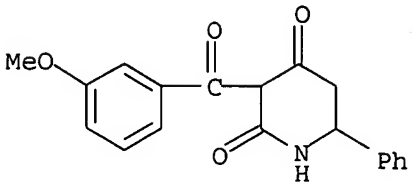
RN 118263-69-7 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl-3-[3-(trifluoromethyl)benzoyl]- (9CI) (CA INDEX NAME)



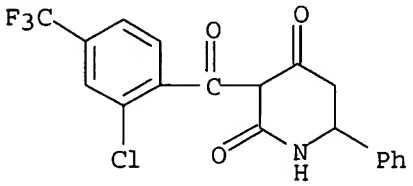
RN 118263-70-0 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-methylbenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



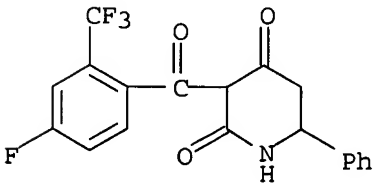
RN 118263-71-1 HCAPLUS
CN 2,4-Piperidinedione, 3-(3-methoxybenzoyl)-6-phenyl- (9CI) (CA INDEX NAME)



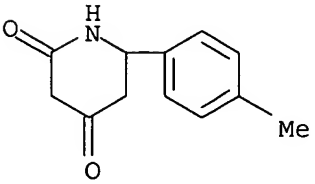
RN 118264-33-8 HCAPLUS
CN 2,4-Piperidinedione, 3-[2-chloro-4-(trifluoromethyl)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



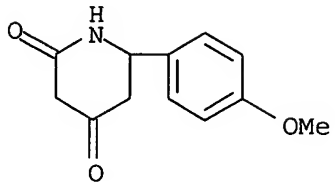
RN 118272-20-1 HCAPLUS
CN 2,4-Piperidinedione, 3-[4-fluoro-2-(trifluoromethyl)benzoyl]-6-phenyl- (9CI) (CA INDEX NAME)



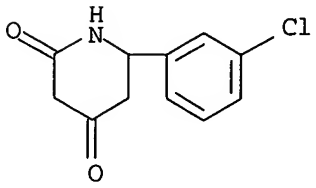
IT **118263-72-2P 118263-73-3P 118263-74-4P**
**118263-75-5P 118263-76-6P 118263-93-7P**
**118263-98-2P 118264-04-3P 118281-17-7P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of, for benzoylpiperidinedione **herbicides**)
RN 118263-72-2 HCAPLUS
CN 2,4-Piperidinedione, 6-(4-methylphenyl)- (9CI) (CA INDEX NAME)



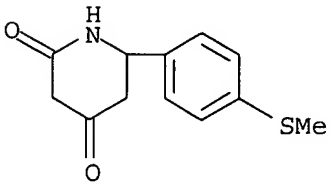
RN 118263-73-3 HCAPLUS
CN 2,4-Piperidinedione, 6-(4-methoxyphenyl)- (9CI) (CA INDEX NAME)



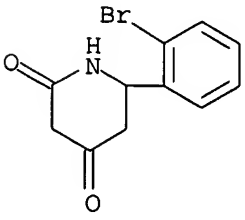

RN 118263-74-4 HCAPLUS
CN 2,4-Piperidinedione, 6-(3-chlorophenyl)- (9CI) (CA INDEX NAME)



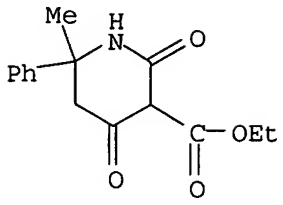

RN 118263-75-5 HCAPLUS
CN 2,4-Piperidinedione, 6-[4-(methylthio)phenyl]- (9CI) (CA INDEX NAME)



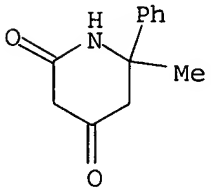

RN 118263-76-6 HCAPLUS
CN 2,4-Piperidinedione, 6-(2-bromophenyl)- (9CI) (CA INDEX NAME)



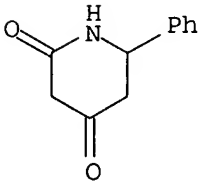

RN 118263-93-7 HCAPLUS
CN 3-Piperidinecarboxylic acid, 6-methyl-2,4-dioxo-6-phenyl-, ethyl ester (9CI) (CA INDEX NAME)



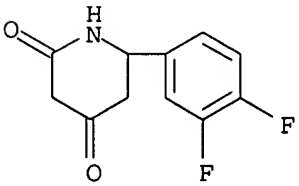
RN 118263-98-2 HCAPLUS
CN 2,4-Piperidinedione, 6-methyl-6-phenyl- (9CI) (CA INDEX NAME)



RN 118264-04-3 HCAPLUS
CN 2,4-Piperidinedione, 6-phenyl- (9CI) (CA INDEX NAME)



RN 118281-17-7 HCAPLUS
CN 2,4-Piperidinedione, 6-(3,4-difluorophenyl)- (9CI) (CA INDEX NAME)



=> d l16 ibib abs hitstr tot

L16 ANSWER 1 OF 1 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1989:38898 HCAPLUS
DOCUMENT NUMBER: 110:38898
TITLE: Preparation of benzoylpiperidinediones and other cyclic diones as **herbicides**
INVENTOR(S): Geach, Neil Jonathan; Gilmour, James; Hatton, Leslie

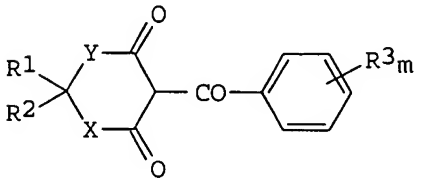
| | |
|---|---|
| | Roy; Smith, Philip Henry Gaunt |
| PATENT ASSIGNEE(S): | May and Baker Ltd., UK |
| SOURCE: | Eur. Pat. Appl., 31 pp. |
| | CODEN: EPXXDW |
| DOCUMENT TYPE: | Patent |
| LANGUAGE: | English |
| FAMILY ACC. NUM. COUNT: | 1 |
| PATENT INFORMATION: | |

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| EP 278742 | A2 | 19880817 | EP 1988-301103 | 19880210 <-- |
| EP 278742 | A3 | 19891115 | | |
| R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE | | | | |
| FI 8800591 | A | 19880812 | FI 1988-591 | 19880209 <-- |
| AU 8811454 | A1 | 19880818 | AU 1988-11454 | 19880209 <-- |
| AU 607183 | B2 | 19910228 | | |
| ZA 8800911 | A | 19900131 | ZA 1988-911 | 19880209 <-- |
| DK 8800680 | A | 19880812 | DK 1988-680 | 19880210 <-- |
| JP 63203644 | A2 | 19880823 | JP 1988-29989 | 19880210 <-- |
| HU 48092 | A2 | 19890529 | HU 1988-607 | 19880210 <-- |
| HU 203941 | B | 19911128 | | |
| CS 273340 | B2 | 19910312 | CS 1988-839 | 19880210 <-- |
| RO 100664 | B1 | 19921120 | RO 1988-132128 | 19880210 <-- |
| BR 8800580 | A | 19880927 | BR 1988-580 | 19880211 <-- |
| DD 282005 | A5 | 19900829 | DD 1988-312844 | 19880211 <-- |
| US 5114461 | A | 19920519 | US 1989-440208 | 19891122 <-- |
| AU 9066910 | A1 | 19910627 | AU 1990-66910 | 19901123 <-- |

| | | | |
|---|---|---|---|
| PRIORITY APPLN. INFO.: | GB 1987-3068 | A | 19870211 |
| | GB 1987-7608 | A | 19870331 |
| | US 1988-154031 | B1 | 19880209 |

OTHER SOURCE(S): MARPAT 110:38898

GI



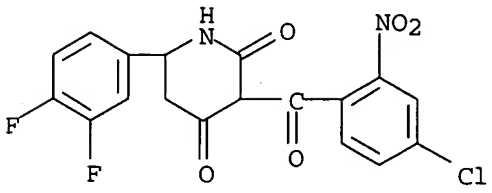
I

AB Title compds. I [X = CH2, O, S, R4N; R4 = H, C1-6 alkyl, C2-7 alkoxycarbonyl; Y = CH2, O, R5R6N; R5 = H, C1-6 alkyl, C2-7 alkoxycarbonyl; R6 = H, C1-6 alkyl; R1 = H; (un)substituted C1-6 alkyl, C3-6 cycloalkyl; R2 = H, R1R2 = C2-6 alkylene, etc.; R3 = halo, HO, H2OC, O2N, cyano, H2N, [(un)substituted C1-6 alkyl]carbamoyl, etc.; m = 0-5], or an agriculturally acceptable salt thereof, were prepared 2,4-(O2N)ClC6H3COCl in CH2Cl2 was added at 5-10° to 6,6-dimethylpiperidine-2,4-dione and Et3N in CH2Cl2, the mixture stirred at ambient temperature for 18 h, Et3N and Me2COHCN were added successively, and the mixture stirred at ambient temperature to give I (R1, R2 = Me; R3m = 2-NO2, 4-Cl; X = NH; Y = CH2) (II). In preemergence test, II at 2000 g/ha gave 100% control of Chenopodium album.

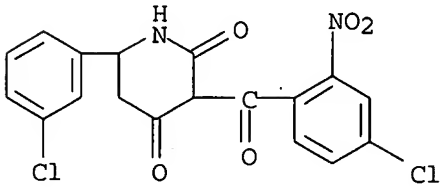
IT **118262-36-5P 118263-48-2P 118263-52-8P**

RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)
(preparation of, as herbicide)

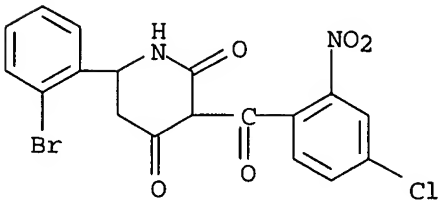
RN 118262-36-5 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(3,4-difluorophenyl)- (9CI) (CA INDEX NAME)



RN 118263-48-2 HCAPLUS
CN 2,4-Piperidinedione, 3-(4-chloro-2-nitrobenzoyl)-6-(3-chlorophenyl)- (9CI) (CA INDEX NAME)

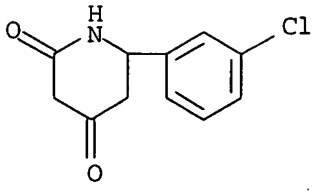


RN 118263-52-8 HCAPLUS
CN 2,4-Piperidinedione, 6-(2-bromophenyl)-3-(4-chloro-2-nitrobenzoyl)- (9CI) (CA INDEX NAME)

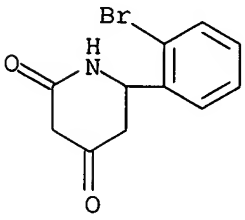


IT **118263-74-4P 118263-76-6P 118281-17-7P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of, for benzoylpiperidinedione **herbicides**)

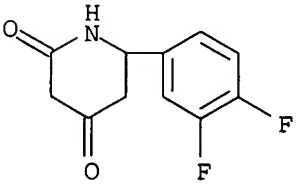
RN 118263-74-4 HCAPLUS
CN 2,4-Piperidinedione, 6-(3-chlorophenyl)- (9CI) (CA INDEX NAME)



RN 118263-76-6 HCAPLUS
CN 2,4-Piperidinedione, 6-(2-bromophenyl)- (9CI) (CA INDEX NAME)



RN 118281-17-7 HCAPLUS
CN 2,4-Piperidinedione, 6-(3,4-difluorophenyl)- (9CI) (CA INDEX NAME)



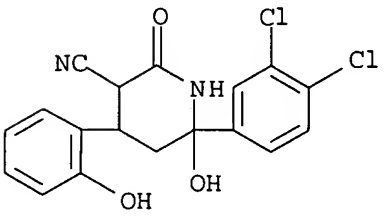
=> d l14 ibib abs hitstr 1-10

L14 ANSWER 1 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1998:213736 HCAPLUS
DOCUMENT NUMBER: 128:243927
TITLE: Ethyl cyanoacetate in organic synthesis new pyridines and benzopyrano[3,4-c]pyridines
AUTHOR(S): Haggag, B.
CORPORATE SOURCE: National Research Centre, Cairo, Egypt
SOURCE: Al-Azhar Bulletin of Science (1996), 7(2), 1217-1227
CODEN: ABSCE7; ISSN: 1110-2535
PUBLISHER: Al-Azhar University, Faculty of Science
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Reaction of Et cyanoacetate with 1,3-diaryl-2-propen-1-ones under basic conditions was investigated to afford Michael-adducts. The latter, upon treating with ammonium acetate gave the corresponding 3-cyano-2(1H)-pyridone derivs. On the other hand, reaction of 3-(2-hydroxyaryl)-2-propen- 1-ones with Et cyanoacetate gave the corresponding

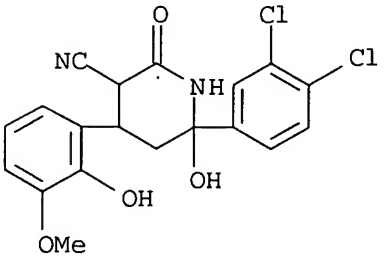
Et 2-amino-4H[1]benzopyran-3-carboxylates which upon treating with ammonium acetate gave the corresponding ethyl-2-amino-4,5-dihydropyridine-3-carboxylates accompanied with 4-amino-5-oxo-[1]benzopyrano[3,4-c]pyridines. Meanwhile, for the reaction of propenone derivs. with Et cyanoacetate in the presence of excess ammonium acetate led to the formation of 3,4-dihydrobenzopyrano[3,4-c]pyridine-4,5- diones along with 2-piperidone. The latter could also be isolated through the reaction of 3-cyanocoumarin derivs. with 3,4-dichloroacetophenone in the presence of ammonium acetate.

IT **204907-27-7P 204907-29-9P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of benzopyranopyridines and pyridines from Et cyanoacetate)

RN 204907-27-7 HCAPLUS
CN 3-Piperidinecarbonitrile, 6-(3,4-dichlorophenyl)-6-hydroxy-4-(2-hydroxyphenyl)-2-oxo- (9CI) (CA INDEX NAME)




RN 204907-29-9 HCAPLUS
CN 3-Piperidinecarbonitrile, 6-(3,4-dichlorophenyl)-6-hydroxy-4-(2-hydroxy-3-methoxyphenyl)-2-oxo- (9CI) (CA INDEX NAME)



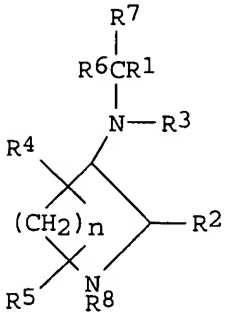

REFERENCE COUNT: 20 THERE ARE 20 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L14 ANSWER 2 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1995:975371 HCAPLUS
DOCUMENT NUMBER: 124:29605
TITLE: Preparation of aralkylamino-substituted azacyclic tachykinin antagonists
INVENTOR(S): Maccoss, Malcolm; Swain, Christopher John
PATENT ASSIGNEE(S): Merck Sharp and Dohme Ltd., UK
SOURCE: PCT Int. Appl., 49 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | | DATE | |
|---|---|---|---|---|---|---|
| WO 9520575 | A1 | 19950803 | WO 1995-GB153 | | 19950126 | <-- |
| W: AM, AT, AU, BB, BG, BR, BY, CA, CH, CN, CZ, DE, DK, EE, ES, FI, GB, GE, HU, JP, KE, KG, KP, KR, KZ, LK, LR, LT, LU, LV, MD, MG, MN, MW, MX, NL, NO, NZ, PL, PT, RO, RU, SD, SE, SI, SK, TJ, TT, UA, US | | | | | | |
| RW: KE, MW, SD, SZ, AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG | | | | | | |
| CA 2181376 | AA | 19950803 | CA 1995-2181376 | | 19950126 | <-- |
| AU 9514627 | A1 | 19950815 | AU 1995-14627 | | 19950126 | <-- |
| EP 741704 | A1 | 19961113 | EP 1995-906433 | | 19950126 | <-- |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LI, LU, NL, PT, SE | | | | | | |
| JP 09508376 | T2 | 19970826 | JP 1995-519937 | | 19950126 | |
| US 5728716 | A | 19980317 | US 1996-676156 | | 19960711 | |
| PRIORITY APPLN. INFO.: | | | GB 1994-1639 | A | 19940128 | |
| | | | GB 1994-1642 | A | 19940128 | |
| | | | WO 1995-GB153 | W | 19950126 | |

OTHER SOURCE(S): MARPAT 124:29605

GI



I

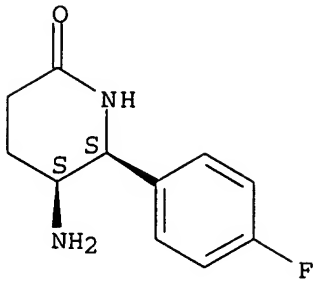
AB The title compds. [I; n = 1-3 and any carbon atom of (CH2)n may be substituted by R4 and/or R5; R1 = (un)substituted alkylphenyl; R2 = (un)substituted aryl, (un)substituted heteroaryl; R3 = H, C1-6 alkyl; R4, R5 = H, halogen, C1-6 alkyl, etc; R6 = H, C1-6 alkyl; R7 = H, C1-6 alkyl optionally substituted by a hydroxy group, alkylamino, etc.; R8 = H, CORa, CO2Ra, COCONRaRb, COCO2Ra, (un)substituted C1-6 alkyl; Ra, Rb = H, (un)substituted alkyl, (un)substituted Ph], useful as tachykinin antagonists (no data) in the treatment of pain (no data), inflammation (no data), migraine (no data), and emesis (no data), are prepared Thus, cis-(±)-3-(2-hydroxy-1-phenylethylamino)phenylpiperidine was prepared from (±)-5-amino-6-phenylpiperidin-2-one and 2-bromo-2-phenylacetic acid.

IT **171274-25-2**
RL: RCT (Reactant); RACT (Reactant or reagent)
(preparation of aralkylamino-substituted azacyclic tachykinin antagonists from)

RN 171274-25-2 HCAPLUS

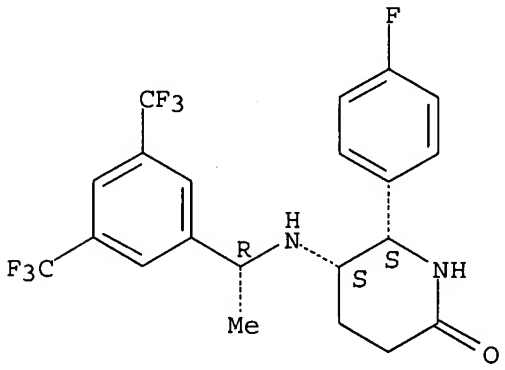
CN 2-Piperidinone, 5-amino-6-(4-fluorophenyl)-, cis- (9CI) (CA INDEX NAME)

Relative stereochemistry.



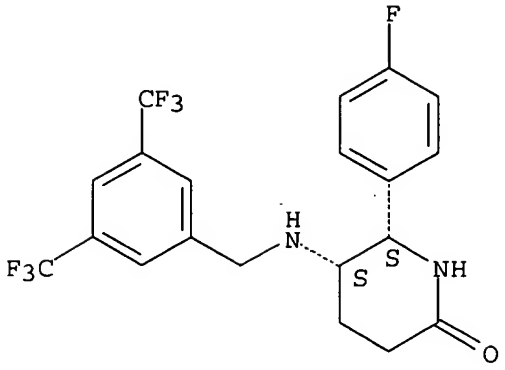
IT **171274-21-8P 171274-22-9P 171482-34-1P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of aralkylamino-substituted azacyclic tachykinin antagonists from)
RN 171274-21-8 HCAPLUS
CN 2-Piperidinone, 5-[[1-[3,5-bis(trifluoromethyl)phenyl]ethyl]amino]-6-(4-fluorophenyl)-, [5α(S*),6α]- (9CI) (CA INDEX NAME)

Relative stereochemistry.



RN 171274-22-9 HCAPLUS
CN 2-Piperidinone, 5-[[[3,5-bis(trifluoromethyl)phenyl]methyl]amino]-6-(4-fluorophenyl)-, dihydrochloride, cis- (9CI) (CA INDEX NAME)

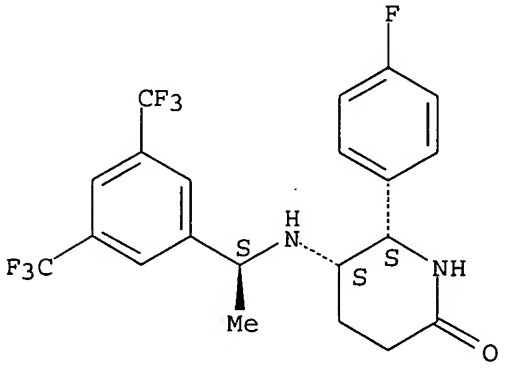
Relative stereochemistry.



●2 HCl

RN 171482-34-1 HCAPLUS
CN 2-Piperidinone, 5-[[1-[3,5-bis(trifluoromethyl)phenyl]ethyl]amino]-6-(4-fluorophenyl)-, [5α(R*),6α]- (9CI) (CA INDEX NAME)

Relative stereochemistry.

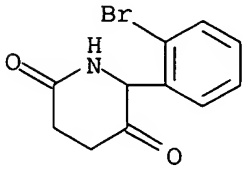


L14 ANSWER 3 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1995:959352 HCAPLUS
DOCUMENT NUMBER: 124:75541
TITLE: Spiro-piperidine non-peptide neurokinin-1 receptor antagonists
AUTHOR(S): Armour, D. R.; Watson, S. P.; Pegg, N. A.; Heron, N. M.; Middlemiss, D.; Chan, C.; Cholerton, T. J.; Hubbard, T.; Vinader, M. V.; et al.
CORPORATE SOURCE: Glaxo-Wellcome Medicines Res. Centre, Stevenage, Hertfordshire, SG1 2NY, UK
SOURCE: Bioorganic & Medicinal Chemistry Letters (**1995**), 5(22), 2671-6
CODEN: BMCLE8; ISSN: 0960-894X
PUBLISHER: Elsevier
DOCUMENT TYPE: Journal
LANGUAGE: English
AB The synthesis and activity of a novel spiro-piperidine non-peptide

antagonist of the neurokinin-1 (NK1) receptor is described. Despite having essentially the same solution conformation as CP 99,994 at physiol. pH, the new antagonist has reduced affinity for the NK1 receptor.

IT **160822-16-2**
RL: RCT (Reactant); RACT (Reactant or reagent)
(spiro-piperidine non-peptide neurokinin-1 receptor antagonists)

RN 160822-16-2 HCAPLUS
CN 2,5-Piperidinedione, 6-(2-bromophenyl)- (9CI) (CA INDEX NAME)




L14 ANSWER 4 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1995:823012 HCAPLUS
DOCUMENT NUMBER: 123:228191
TITLE: Preparation of 3-(5-tetrazolylbenzyl)piperidinamine derivatives as tachykinin antagonists
INVENTOR(S): Armour, Duncan Robert; Evans, Brian; Giblin, Gerard Martin Paul; Hann, Michael Menteith; Hubbard, Tania; Lewell, Xiao-Qing; Middlemiss, David; Naylor, Alan; Pegg, Neil Anthony; et al.
PATENT ASSIGNEE(S): Glaxo Group Ltd., UK
SOURCE: PCT Int. Appl., 93 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 9508549 | A1 | 19950330 | WO 1994-EP3129 | 19940920 <-- |
| W: AM, AT, AU, BB, BG, BR, BY, CA, CH, CN, CZ, DE, DK, EE, ES, FI, GB, GE, HU, JP, KE, KG, KP, KR, KZ, LK, LR, LT, LU, LV, MD, MG, MN, MW, NL, NO, NZ, PL, PT, RO, RU, SD, SE, SI, SK, TJ, TT, UA, US, UZ | | | | |
| RW: KE, MW, SD, SZ, AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG | | | | |
| IL 111002 | A1 | 19980924 | IL 1994-111002 | 19940919 |
| CA 2172529 | AA | 19950330 | CA 1994-2172529 | 19940920 <-- |
| AU 9476974 | A1 | 19950410 | AU 1994-76974 | 19940920 <-- |
| AU 681190 | B2 | 19970821 | | |
| ZA 9407291 | A | 19950531 | ZA 1994-7291 | 19940920 <-- |
| EP 720609 | A1 | 19960710 | EP 1994-927627 | 19940920 <-- |
| EP 720609 | B1 | 19981111 | | |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LI, LU, MC, NL, PT, SE | | | | |
| CN 1135218 | A | 19961106 | CN 1994-194145 | 19940920 <-- |
| CN 1061041 | B | 20010124 | | |
| JP 09505275 | T2 | 19970527 | JP 1994-509554 | 19940920 |
| JP 2865872 | B2 | 19990308 | | |
| HU 75648 | A2 | 19970528 | HU 1996-722 | 19940920 |

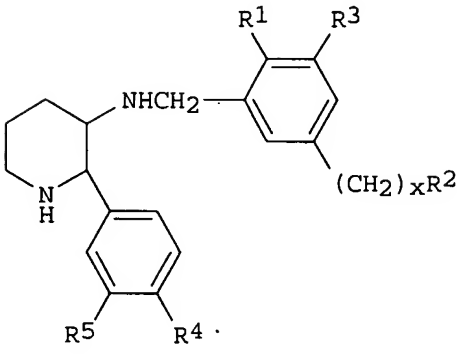
| | | | | | |
|---|---|---|---|---|---|
| AT 173255 | E | 19981115 | AT 1994-927627 | 19940920 | |
| ES 2123829 | T3 | 19990116 | ES 1994-927627 | 19940920 | |
| JP 11106341 | A2 | 19990420 | JP 1998-224991 | 19940920 | |
| CZ 285479 | B6 | 19990811 | CZ 1996-830 | 19940920 | |
| RU 2136675 | C1 | 19990910 | RU 1996-107785 | 19940920 | |
| HR 940575 | B1 | 20000630 | HR 1994-940575 | 19940920 | |
| SK 280901 | B6 | 20000912 | SK 1996-383 | 19940920 | |
| PL 179585 | B1 | 20000929 | PL 1994-313619 | 19940920 | |
| TW 389762 | B | 20000511 | TW 1994-83108909 | 19940926 | |
| FI 9601270 | A | 19960503 | FI 1996-1270 | 19960319 | <-- |
| NO 9601156 | A | 19960521 | NO 1996-1156 | 19960321 | <-- |
| NO 307830 | B1 | 20000605 | | | |
| US 5703240 | A | 19971230 | US 1996-612843 | 19960321 | |
| US 5843966 | A | 19981201 | US 1997-899190 | 19970723 | |

PRIORITY APPLN. INFO.:

| | | |
|---|---|---|
| GB 1993-19606 | A | 19930922 |
| GB 1993-26583 | A | 19931231 |
| JP 1995-509554 | A3 | 19940920 |
| WO 1994-EP3129 | W | 19940920 |
| US 1996-612843 | A1 | 19960321 |

OTHER SOURCE(S): MARPAT 123:228191

GI




I

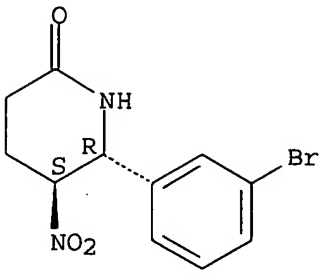
AB Title compds. I (R1 = C1-4 alkoxy; R2 = (substituted)tetrazolyl; R3 = H, halo; R4, R5 = H, halo, C1-4 alkyl, C1-4 alkoxy, F3C) or a salt thereof, useful also as antiemetics, are prepared (2S)-phenylpiperidin-(3S)-ylamine, 2-methoxy-5-(5-trifluoromethyltetrazol-1-yl)benzaldehyde (preparation given), Na triacetoxyborohydride and AcOH were reacted to give an oil which was treated with ethereal HCl to give [2-methoxy-5-(5 trifluoromethyltetrazol-1-yl)benzyl]-([2S,3S]-2-phenylpiperidin-3-yl)amine-2HCl (II). II at 0.03 mg/kg, given to ferret 1.5 h prior to irradiation inhibited radiation-induced emesis. Pharmaceutical formulations comprising I are given. I are claimed for a condition mediated by tachykinins, including substance P and other neurokinins.

IT **168267-18-3P 168267-20-7P 168267-21-8P**
**168267-22-9P 168267-24-1P 168267-25-2P**
**168267-26-3P 168267-28-5P 168267-29-6P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of 3-(5-tetrazolylbenzyl)piperidinamine derivs. as tachykinin antagonists)

RN 168267-18-3 HCAPLUS

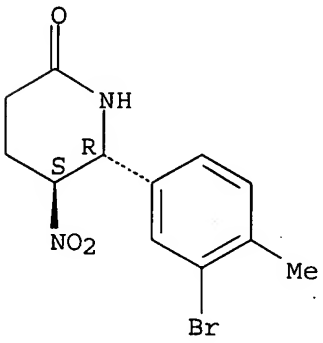
CN 2-Piperidinone, 6-(3-bromophenyl)-5-nitro-, trans- (9CI) (CA INDEX NAME)

Relative stereochemistry.

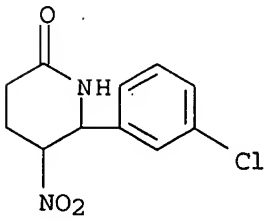



RN 168267-20-7 HCAPLUS
CN 2-Piperidinone, 6-(3-bromo-4-methylphenyl)-5-nitro-, trans- (9CI) (CA INDEX NAME)

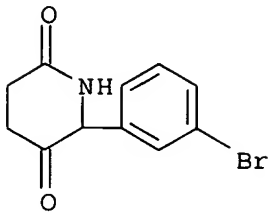
Relative stereochemistry.



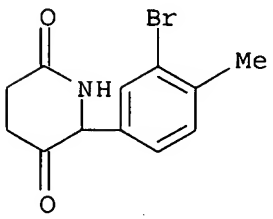

RN 168267-21-8 HCAPLUS
CN 2-Piperidinone, 6-(3-chlorophenyl)-5-nitro- (9CI) (CA INDEX NAME)



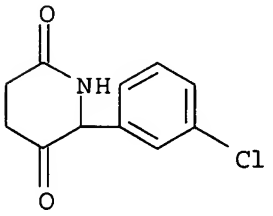

RN 168267-22-9 HCAPLUS
CN 2,5-Piperidinedione, 6-(3-bromophenyl)- (9CI) (CA INDEX NAME)



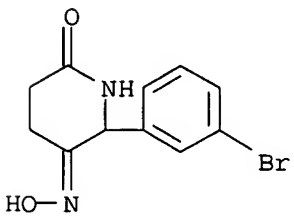
RN 168267-24-1 HCAPLUS
CN 2,5-Piperidinedione, 6-(3-bromo-4-methylphenyl)- (9CI) (CA INDEX NAME)



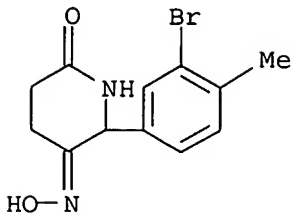
RN 168267-25-2 HCAPLUS
CN 2,5-Piperidinedione, 6-(3-chlorophenyl)- (9CI) (CA INDEX NAME)



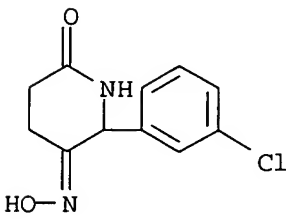
RN 168267-26-3 HCAPLUS
CN 2,5-Piperidinedione, 6-(3-bromophenyl)-, 5-oxime (9CI) (CA INDEX NAME)



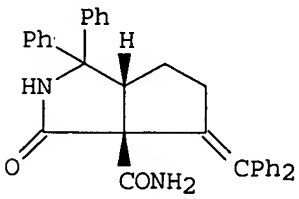
RN 168267-28-5 HCAPLUS
CN 2,5-Piperidinedione, 6-(3-bromo-4-methylphenyl)-, 5-oxime (9CI) (CA INDEX NAME)



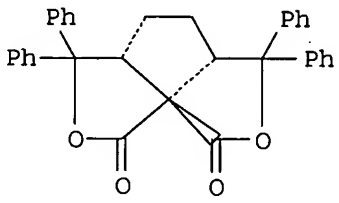
RN 168267-29-6 HCAPLUS
CN 2,5-Piperidinedione, 6-(3-chlorophenyl)-, 5-oxime (9CI) (CA INDEX NAME)



L14 ANSWER 5 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1995:713374 HCAPLUS
DOCUMENT NUMBER: 123:339607
TITLE: Manganese(III)-mediated oxidative radical cyclization. 2. Reaction of 1,1,ω,ω-tetraaryl-substituted terminal alkadienes with malonamide or acetoacetamide
AUTHOR(S): Nishino, Hiroshi; Hashimoto, Hideaki; Korp, James D.; Kurosawa, Kazu
CORPORATE SOURCE: Dep. Chemistry, Kumamoto Univ., Kumamoto, 860, Japan
SOURCE: Bulletin of the Chemical Society of Japan (**1995**), 68(7), 1999-2009
CODEN: BCSJA8; ISSN: 0009-2673
PUBLISHER: Nippon Kagakkai
DOCUMENT TYPE: Journal
LANGUAGE: English
GI



I



II

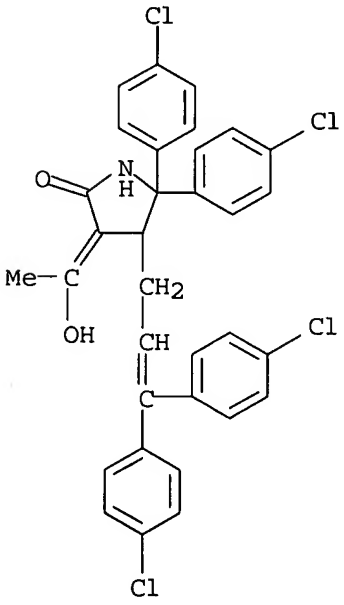
AB The oxidation of 1,1,6,6-tetraaryl-1,5-hexadienes with manganese(III) acetate in the presence of malonamide gave two types of 5-exo cyclization products, 1-carbamoyl-8-(diarylmethylene)-3-azabicyclo[3.3.0]octan-2-ones, e.g., I, and 3,10-dioxatricyclo[6.3.0.01,5]undecane-2,11-diones, e.g., II,

in good to moderate yields. Similar reactions of 1,1,5,5-tetraaryl-1,4-pentadienes or 1,1,7,7-tetraaryl-1,6-heptadienes with malonamide yielded only complex mixts., except for the formation of a small amount of 3,11-dioxatricyclo[7.3.0.01,5]dodecane-2,12-dione. On the other hand, 1,1,5,5-tetraaryl-1,4-pentadienes reacted with acetoacetamide in the presence of manganese(III) acetate to afford 3-carbamoyl-2-methyl-4-(2-propenyl)-4,5-dihydrofurans and 1,4-pentadienes substituted at the 3-position with acetoacetamide. A similar reaction of 1,1,6,6-tetraaryl-1,5-hexadienes with acetoacetamide gave 8-[acetoxy(diaryl)methyl]-3-oxabicyclo[3.3.0]octan-2-ones, 1-acetyl-8-(diarylmethylene)-3-azabicyclo[3.3.0]octan-2-ones, and 4-(3-butenyl)-3-carbamoyl-2-methyl-4,5-dihydrofurans. The selectivity of the inter- and intramol. cyclizations involving the carboxamide moiety of malonamide or acetoacetamide is discussed.

IT **170304-24-2P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 170304-24-2 HCAPLUS

CN 2-Pyrrolidinone, 4-[3,3-bis(4-chlorophenyl)-2-propenyl]-5,5-bis(4-chlorophenyl)-3-(1-hydroxyethylidene)- (9CI) (CA INDEX NAME)




L14 ANSWER 6 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN

ACCESSION NUMBER: 1995:297012 HCAPLUS

DOCUMENT NUMBER: 122:105615

TITLE: A novel palladium(0) catalyzed tandem 1,3-allyl shift and Heck arylation

AUTHOR(S): Watson, Stephen P.; Knox, Graham R.; Heron, Nicola M.

CORPORATE SOURCE: Glaxo Research Development Limited, Hertfordshire, SG12 0DP, UK

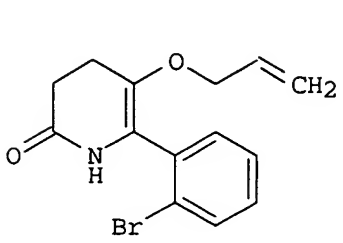
SOURCE: Tetrahedron Letters (**1994**), 35(52), 9763-6
CODEN: TELEAY; ISSN: 0040-4039

PUBLISHER: Elsevier

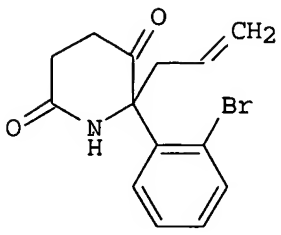
DOCUMENT TYPE: Journal

LANGUAGE: English

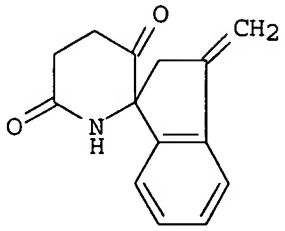
OTHER SOURCE(S): CASREACT 122:105615
GI



I



II

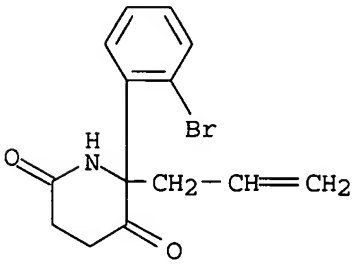


III

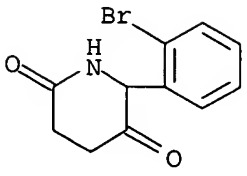
AB On treatment with [Pd(PPh3)4] allyl vinyl ether I undergoes a Pd(0) catalyzed 1,3-oxygen to carbon allyl shift to afford α-allyl ketone II. In the presence of both Pd(PPh3)4 and base the allyl vinyl ether undergoes a Pd(0) catalyzed tandem 1,3-allyl shift and intramol. Heck arylation to give the spiro indane III. Mechanistic investigations suggest that the 1,3-allyl shift proceeds via a π-allyl palladium intermediate.

IT **160822-15-1P 160822-16-2P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(novel palladium-catalyzed tandem allyl shift and Heck arylation)

RN 160822-15-1 HCAPLUS
CN 2,5-Piperidinedione, 6-(2-bromophenyl)-6-(2-propenyl)- (9CI) (CA INDEX NAME)



RN 160822-16-2 HCAPLUS
CN 2,5-Piperidinedione, 6-(2-bromophenyl)- (9CI) (CA INDEX NAME)



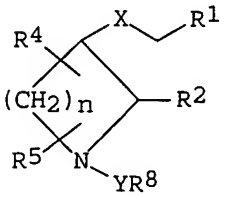
L14 ANSWER 7 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1994:483342 HCAPLUS
DOCUMENT NUMBER: 121:83342
TITLE: Azacyclic tachykinin antagonists
INVENTOR(S): Baker, Raymond; Laddhwahetty, Tamara; Seward, Eileen Mary; Swain, Christopher John
PATENT ASSIGNEE(S): Merck Sharp and Dohme Ltd., UK
SOURCE: PCT Int. Appl., 132 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 9321181 | A1 | 19931028 | WO 1993-GB788 | 19930414 <-- |
| W: AT, AU, BB, BG, BR, CA, CH, CZ, DE, DK, ES, FI, GB, HU, JP, KP, KR, LK, LU, MG, MN, MW, NL, NO, NZ, PL, PT, RO, RU, SD, SE, SK, UA, US | | | | |
| RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG | | | | |
| US 5444074 | A | 19950822 | US 1993-46538 | 19930413 <-- |
| AU 9340765 | A1 | 19931118 | AU 1993-40765 | 19930414 <-- |
| AU 675786 | B2 | 19970220 | | |
| EP 636130 | A1 | 19950201 | EP 1993-910151 | 19930414 <-- |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LI, LU, NL, PT, SE | | | | |
| JP 07505648 | T2 | 19950622 | JP 1993-518131 | 19930414 <-- |
| US 5496833 | A | 19960305 | US 1995-387684 | 19950213 <-- |

PRIORITY APPLN. INFO.:

| | | |
|---|---|---|
| GB 1992-8323 | A | 19920415 |
| GB 1992-16065 | A | 19920728 |
| GB 1992-19686 | A | 19920917 |
| GB 1992-26069 | A | 19921214 |
| US 1993-46538 | A3 | 19930413 |
| WO 1993-GB788 | A | 19930414 |

OTHER SOURCE(S): MARPAT 121:83342
GI



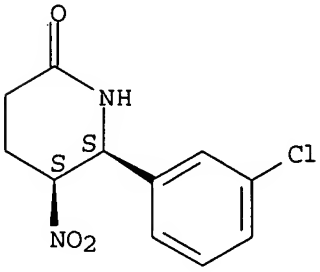
I

AB The title compds. I [R1 = (un)substituted Ph; R2 = (un)substituted aryl, (un)substituted heteroaryl, (un)substituted benzhydryl, (un)substituted PhCH2; R4, R5 = H, halogen, C1-6 alkyl, oxo, etc.; R8 = (un)substituted aromatic heterocycle; X = O, S; Y = (un)substituted C1-4 hydrocarbon chain; n = 1-3], useful as tachykinin antagonists (no data), are prepared and I-containing formulations presented. Thus, hydroxyguanidine sulfate was reacted with (2R,3R)-3-[[3,5-bis(trifluoromethyl)phenyl]methoxy]-1-(carbomethoxy)methyl-2-phenylpiperidine, producing 3-amino-5-[[(2R,3R)-3-[[3,5-bis(trifluoromethyl)phenyl]methoxy]-2-phenylpiperidino]methyl]-1,2,4-oxadiazole.

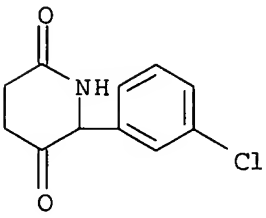
IT **155765-33-6 168267-25-2**
RL: RCT (Reactant); RACT (Reactant or reagent)
(preparation as intermediate in preparation of azacyclic tachykinin antagonists)

RN 155765-33-6 HCAPLUS
CN 2-Piperidinone, 6-(3-chlorophenyl)-5-nitro-, cis- (9CI) (CA INDEX NAME)

Relative stereochemistry.

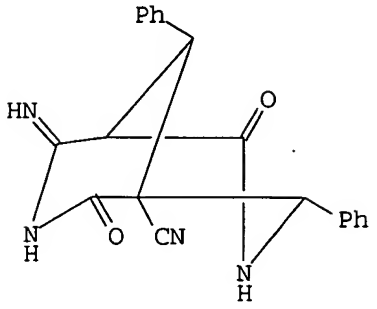



RN 168267-25-2 HCAPLUS
CN 2,5-Piperidinedione, 6-(3-chlorophenyl)- (9CI) (CA INDEX NAME)

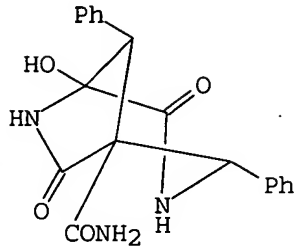



L14 ANSWER 8 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1994:323524 HCAPLUS
DOCUMENT NUMBER: 120:323524
TITLE: Novel cyclodimerization reactions of 2-cyano-3-phenylprop-2-enamide
AUTHOR(S): O'Callaghan, Conor N.; McMurry, T. Brian H.; Cardin, Christine J.; Wilcock, Deborah J.
CORPORATE SOURCE: Trinity Coll., Univ. Chem. Lab., Dublin, Ire.
SOURCE: Journal of Chemical Research, Synopses (**1994**), (2), 60-1,401-27
CODEN: JRPSDC; ISSN: 0308-2342
DOCUMENT TYPE: Journal
LANGUAGE: English

OTHER SOURCE(S): CASREACT 120:323524
GI




I



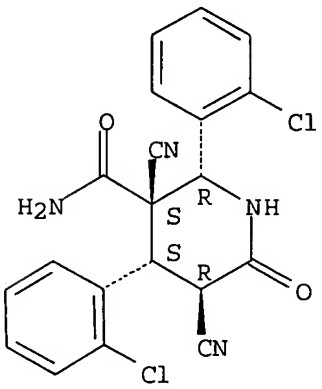

II

AB 4-Imino-8,9-diphenyl-2,6-dioxo-3,7-diazabicyclo[3.3.1]nonane-1-carbonitrile (I) is readily obtained from 2-cyano-3-phenyl-2-propenamide in dry EtOH in the presence of NaOEt; when undried alc. is used, however, the product is 5-hydroxy-2,8-diphenyl-4,7-dioxo-3,6-diazabicyclo[3.2.1]octane-1-carboxamide (II), the structure of which was confirmed by x-ray crystal anal.

IT **154879-16-0P 154879-17-1P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

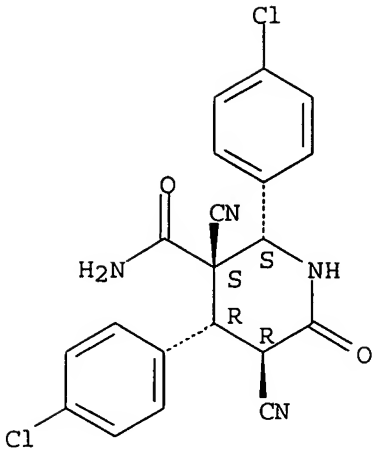
RN 154879-16-0 HCAPLUS
CN 3-Piperidinecarboxamide, 2,4-bis(2-chlorophenyl)-3,5-dicyano-6-oxo-, (2α,3α,4α,5β)- (9CI) (CA INDEX NAME)

Relative stereochemistry.

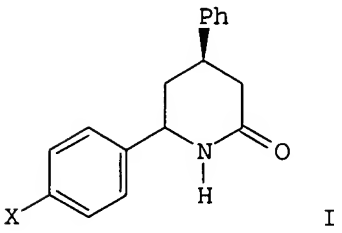



RN 154879-17-1 HCAPLUS
CN 3-Piperidinecarboxamide, 2,4-bis(4-chlorophenyl)-3,5-dicyano-6-oxo-, (2α,3α,4α,5β)- (9CI) (CA INDEX NAME)

Relative stereochemistry.



L14 ANSWER 9 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1994:244592 HCAPLUS
DOCUMENT NUMBER: 120:244592
TITLE: Synthesis and stereochemistry of cis- and trans-4,6-diaryl-2-piperidones
AUTHOR(S): Rao, H. Surya Prakash; Bharathi, Balasubramanian
CORPORATE SOURCE: Dep. Chem., Pondicherry Univ., Pondicherry, 605 014, India
SOURCE: Journal of Chemical Research, Synopses (**1994**), (3), 87
CODEN: JRPSDC; ISSN: 0308-2342
DOCUMENT TYPE: Journal
LANGUAGE: English
OTHER SOURCE(S): CASREACT 120:244592
GI



I

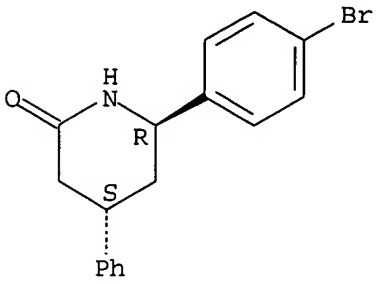
AB A simple, versatile synthetic method for cis- and trans-4,6-diaryl-2-piperidinones I (X = H, Me, halo) was reported. Two-carbon 1,4-addition to variously substituted chalcones and subsequent 2-step reductive amination, and cyclization via oxime intermediates results in formation of cis- and trans-I. The configuration and conformation of cis- and trans-I were assigned from 1H NMR spectra data which indicate that both cis- and trans-I isomers are stabilized in half-chair conformations.

IT **154356-92-0P**, 2-Piperidinone, 6-(4-bromophenyl)-4-phenyl-, trans-
**154356-93-1P**, 2-Piperidinone, 6-(4-chlorophenyl)-4-phenyl-, cis-
**154356-94-2P**, 2-Piperidinone, 6-(4-chlorophenyl)-4-phenyl-, trans-
**154356-95-3P**, 2-Piperidinone, 6-(4-bromophenyl)-4-phenyl-, cis-

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of, from diaryl(oxo)pentanoate)

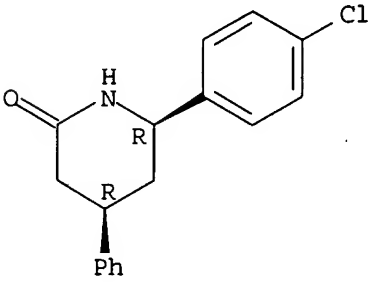
RN 154356-92-0 HCAPLUS
CN 2-Piperidinone, 6-(4-bromophenyl)-4-phenyl-, trans- (9CI) (CA INDEX NAME)

Relative stereochemistry.



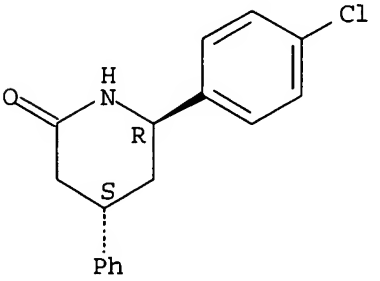

RN 154356-93-1 HCAPLUS
CN 2-Piperidinone, 6-(4-chlorophenyl)-4-phenyl-, cis- (9CI) (CA INDEX NAME)

Relative stereochemistry.



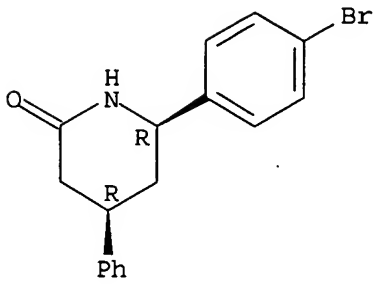

RN 154356-94-2 HCAPLUS
CN 2-Piperidinone, 6-(4-chlorophenyl)-4-phenyl-, trans- (9CI) (CA INDEX NAME)

Relative stereochemistry.

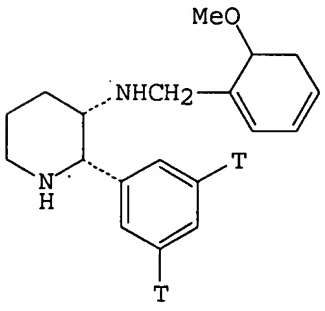



RN 154356-95-3 HCAPLUS
CN 2-Piperidinone, 6-(4-bromophenyl)-4-phenyl-, cis- (9CI) (CA INDEX NAME)

Relative stereochemistry.




L14 ANSWER 10 OF 32 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1994:77147 HCAPLUS
DOCUMENT NUMBER: 120:77147
TITLE: Synthesis, in vitro binding profile, and autoradiographic analysis of [3H]-cis-3-[(2-methoxybenzyl)amino]-2-phenylpiperidine, a highly potent and selective nonpeptide substance P receptor antagonist radioligand
AUTHOR(S): Rosen, Terry; Seeger, Thomas F.; McLean, Stafford; Desai, Manoj C.; Guarino, Karen J.; Bryce, Dianne; Pratt, Kara; Heym, James; Chalabi, Philip M.; et al.
CORPORATE SOURCE: Dep. Med., Pfizer Cent. Res., Groton, CT, 06340, USA
SOURCE: Journal of Medicinal Chemistry (1993), 36(21), 3197-201
CODEN: JMCMAR; ISSN: 0022-2623
DOCUMENT TYPE: Journal
LANGUAGE: English
GI

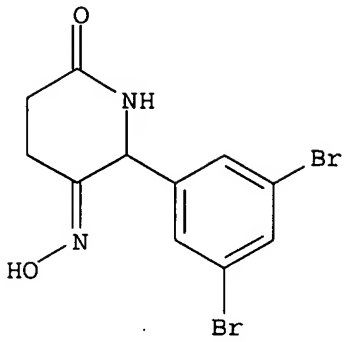



I

AB The synthesis of the title compound I, a highly potent and selective NK1 receptor antagonist radioligand, is described. The in vitro binding pharmacol. and autoradiog. distribution of I in guinea pig brain following peripheral administration are also reported.

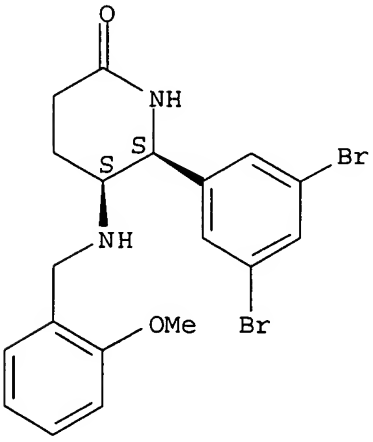
IT **151296-75-2P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation and catalytic reduction of, stereochem. of amine from)

RN 151296-75-2 HCAPLUS
CN 2,5-Piperidinedione, 6-(3,5-dibromophenyl)-, 5-oxime (9CI) (CA INDEX NAME)



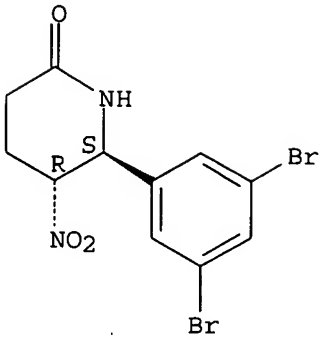
IT **151296-76-3P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation and hydride reduction of)
RN 151296-76-3 HCAPLUS
CN 2-Piperidinone, 6-(3,5-dibromophenyl)-5-[[(2-methoxyphenyl)methyl]amino]-, cis- (9CI) (CA INDEX NAME)

Relative stereochemistry.

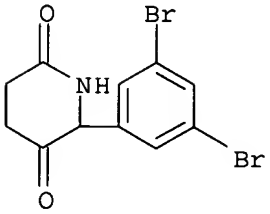


IT **151296-74-1P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation and oxidation of, oxopiperidinone from)
RN 151296-74-1 HCAPLUS
CN 2-Piperidinone, 6-(3,5-dibromophenyl)-5-nitro-, trans- (9CI) (CA INDEX NAME)

Relative stereochemistry.

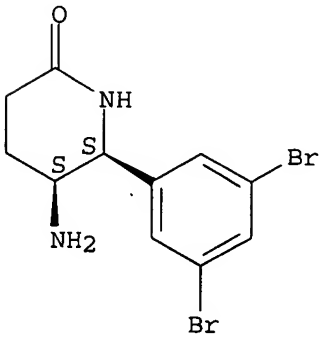


IT **151296-71-8P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation and oximation of)
RN 151296-71-8 HCAPLUS
CN 2,5-Piperidinedione, 6-(3,5-dibromophenyl)- (9CI) (CA INDEX NAME)



IT **151296-72-9P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation and reductive alkylation of, with methoxybenzaldehdye)
RN 151296-72-9 HCAPLUS
CN 2-Piperidinone, 5-amino-6-(3,5-dibromophenyl)-, cis- (9CI) (CA INDEX NAME)

Relative stereochemistry.



=> FIL REGISTRY

| COST IN U.S. DOLLARS | SINCE FILE ENTRY | TOTAL SESSION |
|---|---|---|
| FULL ESTIMATED COST | 130.77 | 470.79 |

| DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) | SINCE FILE ENTRY | TOTAL SESSION |
|---|---|---|
| CA SUBSCRIBER PRICE | -16.79 | -16.79 |

FILE 'REGISTRY' ENTERED AT 16:31:27 ON 29 AUG 2005


Property values tagged with IC are from the ZIC/VINITI data file provided by InfoChem.

STRUCTURE FILE UPDATES: 28 AUG 2005 HIGHEST RN 861926-07-0
DICTIONARY FILE UPDATES: 28 AUG 2005 HIGHEST RN 861926-07-0

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH JULY 14, 2005

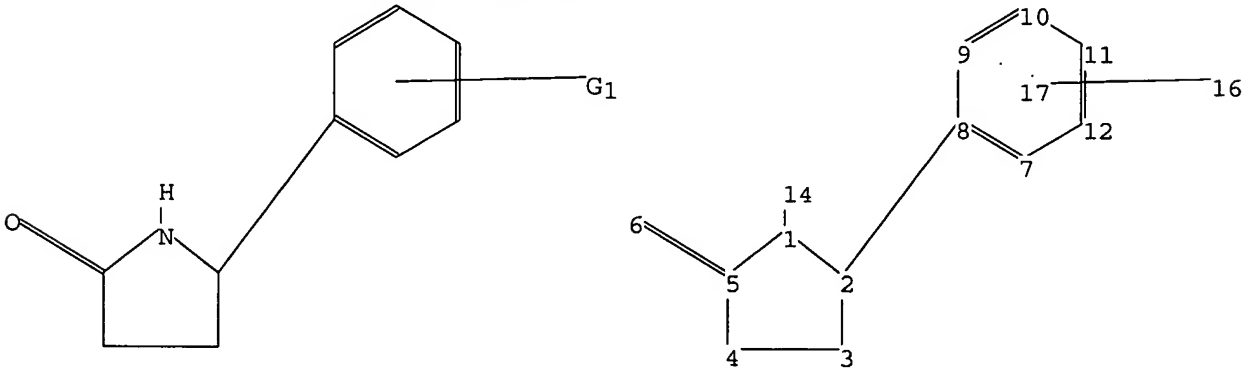
Please note that search-term pricing does apply when conducting SmartSELECT searches.

**********
* *
* The CA roles and document type information have been removed from *
* the IDE default display format and the ED field has been added, *
* effective March 20, 2005. A new display format, IDERL, is now *
* available and contains the CA role and document type information. *
* *
**********

Structure search iteration limits have been increased. See HELP SLIMITS for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at:
http://www.cas.org/ONLINE/DBSS/registryss.html

=>
Uploading C:\Program Files\Stnexp\Queries\10768294b.str



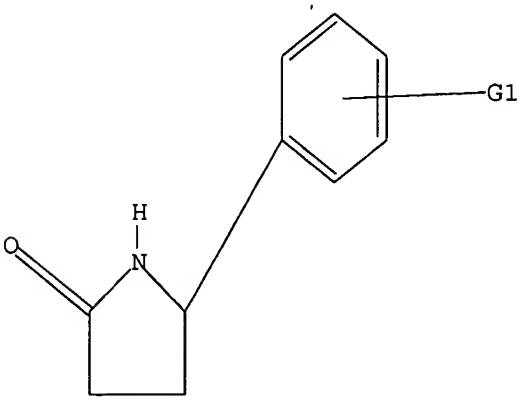
chain nodes :
6 14 16
ring nodes :
1 2 3 4 5 7 8 9 10 11 12
chain bonds :
1-14 2-8 5-6
ring bonds :
1-2 1-5 2-3 3-4 4-5 7-8 7-12 8-9 9-10 10-11 11-12
exact/norm bonds :
1-2 1-5 5-6
exact bonds :
1-14 2-3 2-8 3-4 4-5
normalized bonds :
7-8 7-12 8-9 9-10 10-11 11-12
isolated ring systems :
containing 1 : 7 :

G1:X,CN

Match level :
1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:CLASS 7:Atom 8:Atom 9:Atom 10:Atom
11:Atom 12:Atom 14:CLASS 16:CLASS 17:CLASS

L17 STRUCTURE UPLOADED

=> d l17
L17 HAS NO ANSWERS
L17 STR




G1 X,CN

Structure attributes must be viewed using STN Express query preparation.

=> s l17
SAMPLE SEARCH INITIATED 16:31:49 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED - 4416 TO ITERATE

45.3% PROCESSED 2000 ITERATIONS 3 ANSWERS
INCOMPLETE SEARCH (SYSTEM LIMIT EXCEEDED)
SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE **COMPLETE**
BATCH **COMPLETE**
PROJECTED ITERATIONS: 84335 TO 92305
PROJECTED ANSWERS: 3 TO 286

L18 3 SEA SSS SAM L17

=> s l17 sss full
FULL SEARCH INITIATED 16:31:57 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - 86931 TO ITERATE

100.0% PROCESSED 86931 ITERATIONS 76 ANSWERS
SEARCH TIME: 00.00.03

L19 76 SEA SSS FUL L17

=> FIL HCAPLUS
COST IN U.S. DOLLARS

| | SINCE FILE ENTRY | TOTAL SESSION |
|---|---|---|
| FULL ESTIMATED COST | 161.33 | 632.12 |

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

| | SINCE FILE ENTRY | TOTAL SESSION |
|---|---|---|
| CA SUBSCRIBER PRICE | 0.00 | -16.79 |

FILE 'HCAPLUS' ENTERED AT 16:32:06 ON 29 AUG 2005
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.


FILE COVERS 1907 - 29 Aug 2005 VOL 143 ISS 10
FILE LAST UPDATED: 28 Aug 2005 (20050828/ED)

New CAS Information Use Policies, enter HELP USAGETERMS for details.

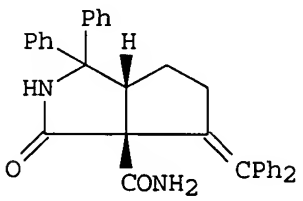
This file contains CAS Registry Numbers for easy and accurate
substance identification.

=> s l19
L20 27 L19

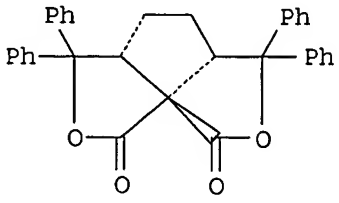
=> s l20 and py<=1996
17466452 PY<=1996
L21 9 L20 AND PY<=1996

```
=> s l20 and pesticides
         61855 PESTICIDES
L22          6 L20 AND PESTICIDES

=> s l21 and pesticides
         61855 PESTICIDES
L23          0 L21 AND PESTICIDES

=> d l21 ibib abs hitstr tot
```

L21 ANSWER 1 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1995:713374 HCAPLUS
DOCUMENT NUMBER: 123:339607
TITLE: Manganese(III)-mediated oxidative radical cyclization. 2. Reaction of 1,1,ω,ω-tetraaryl-substituted terminal alkadienes with malonamide or acetoacetamide
AUTHOR(S): Nishino, Hiroshi; Hashimoto, Hideaki; Korp, James D.; Kurosawa, Kazu
CORPORATE SOURCE: Dep. Chemistry, Kumamoto Univ., Kumamoto, 860, Japan
SOURCE: Bulletin of the Chemical Society of Japan (**1995**), 68(7), 1999-2009
CODEN: BCSJA8; ISSN: 0009-2673
PUBLISHER: Nippon Kagakkai
DOCUMENT TYPE: Journal
LANGUAGE: English
GI




I

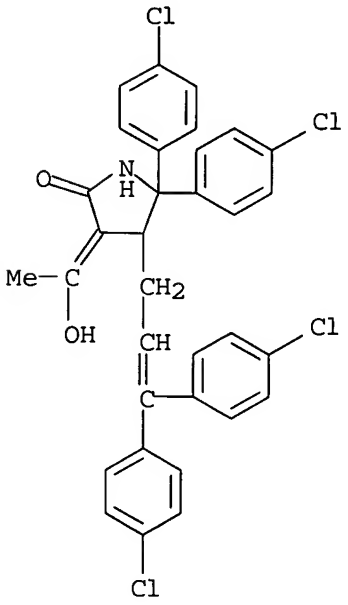



II

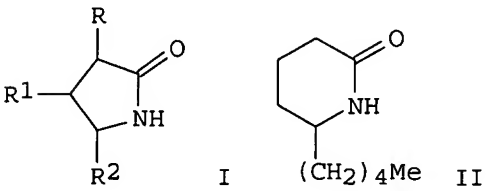
AB The oxidation of 1,1,6,6-tetraaryl-1,5-hexadienes with manganese(III) acetate in the presence of malonamide gave two types of 5-exo cyclization products, 1-carbamoyl-8-(diarylmethylene)-3-azabicyclo[3.3.0]octan-2-ones, e.g., I, and 3,10-dioxatricyclo[6.3.0.01,5]undecane-2,11-diones, e.g., II, in good to moderate yields. Similar reactions of 1,1,5,5-tetraaryl-1,4-pentadienes or 1,1,7,7-tetraaryl-1,6-heptadienes with malonamide yielded only complex mixts., except for the formation of a small amount of 3,11-dioxatricyclo[7.3.0.01,5]dodecane-2,12-dione. On the other hand, 1,1,5,5-tetraaryl-1,4-pentadienes reacted with acetoacetamide in the presence of manganese(III) acetate to afford 3-carbamoyl-2-methyl-4-(2-propenyl)-4,5-dihydrofurans and 1,4-pentadienes substituted at the 3-position with acetoacetamide. A similar reaction of 1,1,6,6-tetraaryl-1,5-hexadienes with acetoacetamide gave 8-[acetoxy(diaryl)methyl]-3-oxabicyclo[3.3.0]octan-2-ones, 1-acetyl-8-(diarylmethylene)-3-azabicyclo[3.3.0]octan-2-ones, and 4-(3-butenyl)-3-carbamoyl-2-methyl-4,5-dihydrofurans. The selectivity of the inter- and intramol. cyclizations involving the carboxamide moiety of malonamide or acetoacetamide is discussed.

IT **170304-24-2P**

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)
RN 170304-24-2 HCAPLUS
CN 2-Pyrrolidinone, 4-[3,3-bis(4-chlorophenyl)-2-propenyl]-5,5-bis(4-chlorophenyl)-3-(1-hydroxyethylidene)- (9CI) (CA INDEX NAME)



L21 ANSWER 2 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1984:438294 HCAPLUS
DOCUMENT NUMBER: 101:38294
TITLE: A liquid chromatographic method for resolving chiral lactams as their diastereomeric ureide derivatives
AUTHOR(S): Pirkle, William H.; Robertson, Michael R.; Hyun, Myung Ho
CORPORATE SOURCE: Sch. Chem. Sci., Univ. Illinois, Urbana, IL, 61801, USA
SOURCE: Journal of Organic Chemistry (**1984**), 49(13), 2433-7
CODEN: JOCEAH; ISSN: 0022-3263
DOCUMENT TYPE: Journal
LANGUAGE: English
OTHER SOURCE(S): CASREACT 101:38294
GI



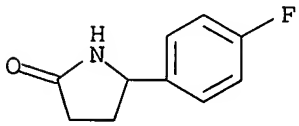
I II

AB Racemic lactams I (R = R1 = H, R2 = Me, Ph, hexyl, 4-F-C6H4, 4-MeC6H4; R = R2 = H, R1 = Ph; R1 = R2 = H, R = hexyl, Ph) and II reacted with chiral isocyanates (R)-(1-C10H7)CHMeNCO or (S)-PhCHMeNCO to give diastereomeric ureides that were readily separated by chromatog. on silica. The elution order and sense of NMR nonequivalence of each pair of diastereomeric ureides was related to relative (and hence absolute) configuration of the lactam enantiomers, which were readily recovered from the separated ureides. The enantiomeric purity and absolute configuration of these lactams was also determined by NMR using (S)-2,2,2-trifluoro-1-(9-anthryl)ethanol as chiral solvating agent.

IT **90432-58-9**
RL: PROC (Process)
(resolution of, by chromatog. of diastereomeric ureides)

RN 90432-58-9 HCAPLUS

CN 2-Pyrrolidinone, 5-(4-fluorophenyl)- (9CI) (CA INDEX NAME)



L21 ANSWER 3 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN

ACCESSION NUMBER: 1981:603736 HCAPLUS

DOCUMENT NUMBER: 95:203736

TITLE: Benzenesulfonamide derivatives

INVENTOR(S): Lang, Hans Jochen; Muschaweck, Roman; Hropot, Max

PATENT ASSIGNEE(S): Hoechst A.-G., Hung.

SOURCE: Hung. Teljes, 52 pp.
CODEN: HUXXBU

DOCUMENT TYPE: Patent

LANGUAGE: Hungarian

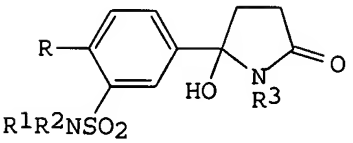
FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| HU 19761 | O | 19810428 | HU 1978-HO2095 | 19780817 <-- |
| HU 177456 | P | 19811028 | | |

PRIORITY APPLN. INFO.: HU 1978-HO2095 19780817

GI



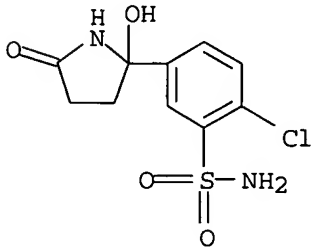
I

AB Diuretic and saluretic benzenesulfonamides I and 4,3-R(R1R2NSO2)C6H3COCH2CH2CONHR3 (II) (R = H, Me, CF3, halo; R1 = H, alkyl; R2 = H, C1-10 alkyl, alkoxy or dialkoxyalkyl, alkenyl, C3-12 cycloalkyl, alkylcycloalkyl, optionally substituted Ph, aralkyl; R1R2 = (CH2)4-5, R3 =

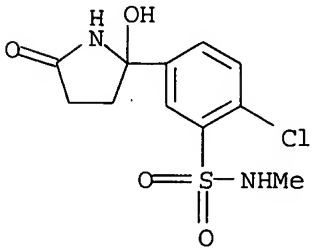
H, alkyl, methoxyalkyl, alkenyl, cycloalkyl, PhCH2) were prepared in various ways. Thus, 4,3-Cl(H2NSO2)C6H3COCH2CH2CO2H in THF was stirred with Et3N and ClCO2Me 5-10 min at 0° and treated with aqueous MeNH2 to give I and II (R = Cl, R1 = R2 = H, R3 = Me).

IT **70324-85-5P 70325-15-4P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 70324-85-5 HCAPLUS
CN Benzenesulfonamide, 2-chloro-5-(2-hydroxy-5-oxo-2-pyrrolidinyl)- (9CI) (CA INDEX NAME)



RN 70325-15-4 HCAPLUS
CN Benzenesulfonamide, 2-chloro-5-(2-hydroxy-5-oxo-2-pyrrolidinyl)-N-methyl- (9CI) (CA INDEX NAME)



L21 ANSWER 4 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1979:439311 HCAPLUS
DOCUMENT NUMBER: 91:39311
TITLE: Benzenesulfonamide derivatives
INVENTOR(S): Lang, Hans Jochen; Muschaweck, Roman; Hropot, Max
PATENT ASSIGNEE(S): Hoechst A.-G., Fed. Rep. Ger.
SOURCE: Ger. Offen., 75 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

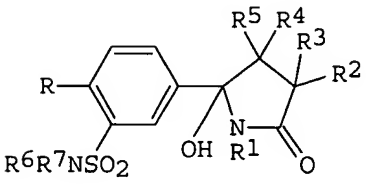
| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| DE 2737195 | A1 | 19790301 | DE 1977-2737195 | 19770818 <-- |
| EP 1051 | A2 | 19790321 | EP 1978-100621 | 19780807 <-- |
| EP 1051 | B1 | 19810211 | | |

R: BE, CH, DE, FR, GB, NL, SE

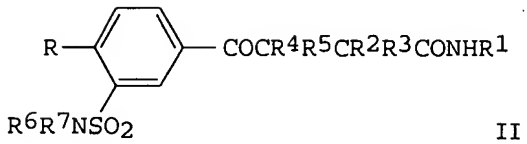
| | | | | |
|---|---|---|---|---|
| ES 472528 | A1 | 19791001 | ES 1978-472528 | 19780811 <-- |
| FI 7802500 | A | 19790219 | FI 1978-2500 | 19780816 <-- |
| US 4235918 | A | 19801125 | US 1978-934063 | 19780816 <-- |
| IL 55369 | A1 | 19840531 | IL 1978-55369 | 19780816 <-- |
| DK 7803635 | A | 19790219 | DK 1978-3635 | 19780817 <-- |
| ZA 7804689 | A | 19790829 | ZA 1978-4689 | 19780817 <-- |
| AU 7839007 | A1 | 19800221 | AU 1978-39007 | 19780817 <-- |
| AU 519998 | B2 | 19820107 | | |
| CA 1117951 | A1 | 19820209 | CA 1978-309538 | 19780817 <-- |
| AT 7805985 | A | 19821015 | AT 1978-5985 | 19780817 <-- |
| AT 371109 | B | 19830610 | | |
| AT 8105411 | A | 19830915 | AT 1981-5411 | 19811217 <-- |
| AT 374454 | B | 19840425 | | |
| AT 8105412 | A | 19830915 | AT 1981-5412 | 19811217 <-- |
| AT 374455 | B | 19840425 | | |
| AT 8105413 | A | 19830915 | AT 1981-5413 | 19811217 <-- |
| AT 374456 | B | 19840425 | | |
| AT 8105414 | A | 19830915 | AT 1981-5414 | 19811217 <-- |
| AT 374457 | B | 19840425 | | |

PRIORITY APPLN. INFO.: DE 1977-2737195 19770818
AT 1978-5985 A 19780817

GI




I



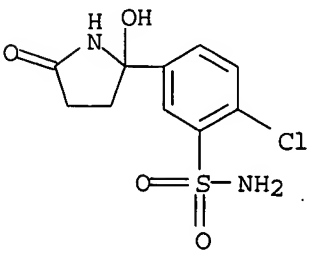

II

AB Tautomeric benzenesulfonamides I and II (R = H, halogen, CF3, Me; R1 = H, alkyl, alkenyl, methoxyalkyl, cycloalkyl, CH2Ph; R2-R6 = H, alkyl; R7 = H, alkyl, alkenyl, cycloalkyl, cycloalkylalkyl, phenylalkyl, optionally substituted by Me, OMe, Cl) were prepared for use as diuretics (no data). Thus, 4,3-Cl(H2NSO2)C6H3COCH2CH2CO2H was treated with MeNH2 in the presence of ClCO2Et to give I and II (R = Cl, R1 = Me, R2-R7 = H).

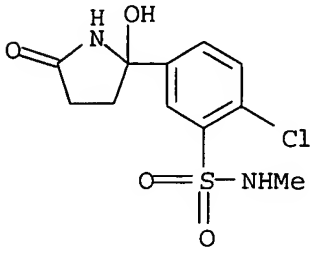
IT **70324-85-5P 70325-15-4P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 70324-85-5 HCAPLUS

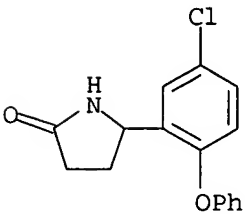
CN Benzenesulfonamide, 2-chloro-5-(2-hydroxy-5-oxo-2-pyrrolidinyl)- (9CI) (CA INDEX NAME)



RN 70325-15-4 HCAPLUS
CN Benzenesulfonamide, 2-chloro-5-(2-hydroxy-5-oxo-2-pyrrolidinyl)-N-methyl- (9CI) (CA INDEX NAME)



L21 ANSWER 5 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1975:57661 HCAPLUS
DOCUMENT NUMBER: 82:57661
TITLE: Condensed heterotricycles. 10,11-Ring-annealed dibenz[b,f][1,4]oxazepines
AUTHOR(S): Nagarajan, K.; Shah, R. K.
CORPORATE SOURCE: Res. Cent., CIBA, Bombay, India
SOURCE: Indian Journal of Chemistry (**1974**), 12(3), 263-9
CODEN: IJOCAP; ISSN: 0019-5103
DOCUMENT TYPE: Journal
LANGUAGE: English
OTHER SOURCE(S): CASREACT 82:57661
GI For diagram(s), see printed CA Issue.
AB Imino chlorides I (R = H, Cl, NO2, R1 = H, OMe, R2 = H, Cl) are converted into γ-hydroxypropylamines and then by treatment with POCl3 and alkali into II. Mercaptotriazolodibenzoxazepines, triazolodibenzoxazepines, and tetrazolodibenzoxazepines were similarly prepared, but the pyrrolidone III could not be cyclized to the pyrrolodibenzoxazepine. During the formation of I (R = NO2, R1 = R2 = H), benzoxazole (IV) is obtained. In the reactions of I (R = NO2, R1 = R2 = H) with amines, similar benzoxazoles are obtained as byproducts.
IT **54585-00-1P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)
RN 54585-00-1 HCAPLUS
CN 2-Pyrrolidinone, 5-(5-chloro-2-phenoxyphenyl)- (9CI) (CA INDEX NAME)

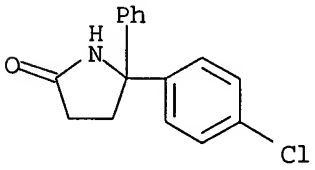


L21 ANSWER 6 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN

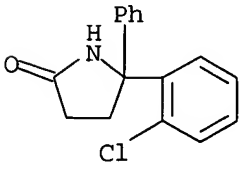
ACCESSION NUMBER: 1974:425541 HCAPLUS
DOCUMENT NUMBER: 81:25541
TITLE: 5,5-Diphenyl-2-pyrrolidinone compounds
INVENTOR(S): Loev, Bernard
PATENT ASSIGNEE(S): Smithkline Corp.
SOURCE: U.S., 4 pp.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| US 3804854 | A | 19740416 | US 1971-189333 | 19711014 <-- |
| PRIORITY APPLN. INFO.: | | | US 1971-189333 A | 19711014 |

GI For diagram(s), see printed CA Issue.
AB The pyrrolidinones I (R = H, OH, OMe; R1 = H, p-Cl, o-Cl) wer prepared Thus, Ph2C:CHCH2CO2H was treated with SOCl2 and NH3 to give Ph2C:CHCH2CONH2 which was cyclized with polyphosphoric acid to give I (R = R1 = H). At 1-5 mg/ kg I were coronary vasodilators in dogs.
IT **52999-70-9P 52999-72-1P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)
RN 52999-70-9 HCAPLUS
CN 2-Pyrrolidinone, 5-(4-chlorophenyl)-5-phenyl- (9CI) (CA INDEX NAME)

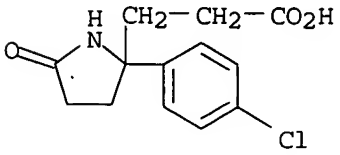



RN 52999-72-1 HCAPLUS
CN 2-Pyrrolidinone, 5-(2-chlorophenyl)-5-phenyl- (9CI) (CA INDEX NAME)




L21 ANSWER 7 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1973:442113 HCAPLUS
DOCUMENT NUMBER: 79:42113
TITLE: Hydrolysis of some γ-cyano-γ-arylpimelonitriles
AUTHOR(S): Fateen, A. K.; Abdel Rahman, S. M.; Kaddah, A. M.
CORPORATE SOURCE: Fac. Sci., Ain Shams Univ., Cairo, Egypt
SOURCE: Indian Journal of Chemistry (**1973**), 11(3), 225-8
CODEN: IJOCAP; ISSN: 0019-5103

DOCUMENT TYPE: Journal
LANGUAGE: English
AB Hydrolysis of 4-RC6H4C(CH2CH2CN)2CN (I, R = Cl, MeO, NO2) with dilute HCl gave II, which were converted to amides via the acid chlorides. Cleavage of the piperidine ring in II was effected with 2N NaOH. I was completely hydrolyzed to the tricaboxylic acid with dilute H2SO4; hydrolysis with aqueous KOH gave the arylcarboxypimelamaide. Treatment of I (r = Cl) with NaOEt gave III.
IT **42307-97-1P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)
RN 42307-97-1 HCAPLUS
CN 2-Pyrrolidinepropanoic acid, 2-(4-chlorophenyl)-5-oxo- (9CI) (CA INDEX NAME)




L21 ANSWER 8 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1968:496456 HCAPLUS
DOCUMENT NUMBER: 69:96456
TITLE: 4-Alkoxy-5-phenyl-3-pyrrolin-2-ones
INVENTOR(S): Hofmann, Corris M.; Safir, Sidney R.
PATENT ASSIGNEE(S): American Cyanamid Co.
SOURCE: U.S., 6 pp.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | | DATE |
|---|---|---|---|---|---|
| US 3401176 | A | 19680910 | US 1965-475250 | | 19650727 <-- |
| PRIORITY APPLN. INFO.: | | | US 1965-475250 | A | 19650727 |

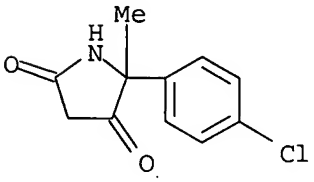
GI For diagram(s), see printed CA Issue.
AB 2-Amino-2-phenylalkanecarboxamides are treated with AcCl or α-alkylacetoacetic esters, and the resulting 2-acetamido-2-phenylalkanecarboxamides treated with polyphosphoric acid or H2SO4 and an alc. to give the corresponding 2-acetamido-2-phenylalkanoic esters. The esters are cyclized and the resulting 5-phenylpyrrolidine-2,4-diones are alkylated to give the title compds. (I). Thus, 19.6 g. AcCl was slowly added to a mixture of 41 g. 2-amino-2-phenylpropionamide, 25 g. Et3N, and 1250 ml. acetone, and the mixture stirred 3 hrs. and worked up to yield 33 g. 2-acetamido-2-phenylpropionamide (II), m. 188-9° (EtOH). Similarly were prepared the following RR1CPhCONH2 (R, R1, and m.p. given): Et, NHAc, 175.5-76°; Pr, NHAc, 156-7°; Me, NHCOCH2Ac, 152-5°; Me, NHCOCH2COEt, 139-40°; and Et, NHCOCH2Ac, 165-6°. A mixture of 30 g. II and 300 g. polyphosphoric acid was warmed (steam bath) 1 hr. and worked up to yield 27 g. Me 2-acetamido-2-phenylpropionate (III), m. 131-2°. Similarly were prepared the following RR1CPhCO2Me (R, R1, and m.p. given): Et, NHAc, 152.5-3.5°; Pr, NHAc, 107-8°; Me, NHCOCH2Ac, 123-5°;

Me, NHCOCH2COEt, 100-2°; Et, NHCOCH2Ac, 95-7°; and H, NHCOCH2Ac, 85-5.5°. A solution of 18.6 g. III in 125 ml. toluene was refluxed with 9.2 g. 54.7% NaH 4 hrs. and worked up to yield 10 g. 5-methyl-5-phenylpyrrolidine-2,4-dione (IV) (R = Me, R1 = H) m. 137-8° (EtOAc). Similarly were prepared the following IV (R, R1, and m.p. given): Et, H, 149-50°; Pr, H, 120-1°; Me, Me, 185-7°; Me, Et, 95-9° (decomposition); Et, Me, 179-81° (decomposition); H, Ac, 126-8°; and H, H, 126-7.5°. A solution of 1.9 g. IV, 1.9 g. Me2SO4, and 10 ml. N NaOMe was refluxed 4 hrs. and worked up to yield 0.9 g. 4-methoxy-5-methyl-5-phenyl-3-pyrrolin-2-one (I) (R = R2 = Me, R1 = H), m. 178-82° (MeOH). Similarly were prepared the following I (R, R1, R2, and m.p. given): Me, H, Et, 156-7°; Me, H, Pr, 112.5-13.5°; Et, H, Me, 154-5°; Et, H, Et, 153-5°; Et, H, Pr, 144-5.5°; Et, H, Bu, 112-13°; Et, H, Me2N(CH2)2, 86-8°; Pr, H, Et, 154.5-5.5°; Me, Me, Me, 180-1°; Me, Me, Et, 142-3.5°; Me, Et, Me, 174-9°; Et, Me, Et, 168-8.5°; and H, H, Me, 180-5°.

IT **19860-41-4P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 19860-41-4 HCAPLUS

CN 2,4-Pyrrolidinedione, 5-(p-chlorophenyl)-5-methyl- (8CI) (CA INDEX NAME)




L21 ANSWER 9 OF 9 HCAPLUS COPYRIGHT 2005 ACS on STN

ACCESSION NUMBER: 1940:33558 HCAPLUS
DOCUMENT NUMBER: 34:33558
ORIGINAL REFERENCE NO.: 34:5078e-i,5079a-f
TITLE: Some reactions of δβ-γ-lactones
AUTHOR(S): Walton, E.
SOURCE: Journal of the Chemical Society, Abstracts ( **1940**) 438-42
CODEN: JCSAAZ; ISSN: 0590-9791
DOCUMENT TYPE: Journal
LANGUAGE: Unavailable

GI For diagram(s), see printed CA Issue.

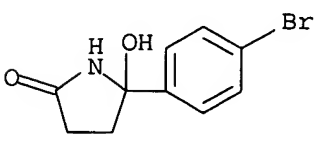
AB Unsatd. lactones of the type R'C:CH.CH2.CO.O (I) react with NH3 and monosubstituted amines to give pyrrolidones, R'(OH)C.CH2. CH2.CO.NR (II), the structure of which has been confirmed in several cases by synthesis from the corresponding succinimide and Grignard compound The N-alkyl-substituted pyrrolidones are all amphoteric, readily decomposed by acid into the corresponding γ-keto acid and stable in alkaline solution γ-Methyl-δβ-crotonolactone (I, R' = Me) and a slight excess of PhNH2, heated 3 min. at 180° and carefully acidified with dilute HCl, give 2-hydroxy-1-phenyl-2-methyl-5-pyrrolidone (III) (II, R = Ph, R' = Me), m. 101°; it is readily soluble in cold 2 N NaOH and does not liberate PhNH2 after boiling 3 min.; the 6 N HCl solution liberates PhNH2 on warming. Addition of Br in AcOH gives the 1-p-bromophenyl derivative, m. 159-61° (decomposition), also prepared from I (R' = Me) and p-BrC6H4NH2. III was also prepared from succinanil and MeMgI after refluxing 4-5 hrs.

γ-Phenyl-δβ-crotonolactone (IV) and concentrated NH4OH, warmed 0.5 min., give 2-hydroxy-2-phenyl-5-pyrrolidone (V) (II, R = H, R' = Ph), m. 123 5° (decomposition); dilute Na2CO3 gives a purple solution; boiling with 2 N NaOH gives a tar and NH3; warming with concentrated HCl for 3 min. gives BzCH2CH2CO2H and NH3; it is soluble in 6 N HCl but not in alkali and is recovered unchanged after treatment with Ac2O, Me2SO4 in alkali and NaNO2 in AcOH. IV and 33% aqueous MeNH2 react vigorously; after passing through green and violet stages, the solution becomes yellow on warming for 20 sec., giving the 1-Me derivative of V, m. 130-5° (decomposition); it dissolves readily in 2 N NaOH, from which it is recovered unchanged; it is also soluble in 6 N HCl but decomps. on warm-ing; alc. NaOH yields an unstable Na derivative, hydrolyzed by H2O to the original compound and giving with Me2SO4 a yellow unsatd. compound IV and 33% aqueous EtNH2 on mixing show color changes from green through violet to pink and give a nearly quant. yield of 2-hydroxy-2-phenyl-1-ethyl-5-pyrrolidone, (II, R = Et, R' = Ph), m. 85-7°; its behavior toward NaOH and HCl is similar to that of the Me derivative; PrNH2 gives the 1-Pr analog, prisms from H2O or leaflets from C6H6-petr. ether, m. 85-6°; it is only slightly soluble in NaOH but dissolves readily in 10 N HCl, which decomps. it on warming. IV and PhNH2, boiled 2 min., give 2-hydroxy-1,2-diphenyl-5-pyrrolidone (II, R = R' = Ph), m. 148-9°; it is insol. and quite stable in HCl and in NaOH but is slowly decomposed by hot aqueous alc. HCl; Br in AcOH gives the 1-p-bromophenyl derivative, m. 166°, also prepared from IV and p-BrC6H4NH2; hot aqueous alc. HCl gives BzCH2CH2CO2H and p-BrC6H4NH2, p-MeC6H4COCH2CH2CO2H (6.4 g.) and 4.2 g. Ac2O, warmed at 100° for 0.5 hr., give 4 g. of γ-p-tolyl-δβ-crotonolactone (V) (I, R' = p-MeC6H4), salmon-pink, m. 111°; heating V with excess concentrated NH4OH at 100° for 20 min. gives 2-hydroxy-2-p-tolyl-5-pyrrolidone (VI), cream, m. 165-7° (decomposition); Limpricht and Doll (Ann. 312, 111(1900)) formulated this as an open-chain amide; it is decomposed by HCl or NaOH. V and 33% aqueous MeNH2 give the 1-Me derivative of VI, hexagonal leaflets with 0.5 mol. H2O (rapid cooling of concentrated solution), m. 92-3°, or anhydrous prisms (slow cooling), m. 132-40°; it is stable in 2 N NaOH but is decomposed by HCl; this also results from succinomethylimide (VII) and p-MeC6H4MgCl, p-BrC6H4COCH2CH2CO2H and Ac2O at 100° for 1 hr. give 60% of γ-p-bromophenyl-β-crotonolactone (VIII), m. 115-30°; warming with excess NH4OH for 2 min. gives 2-hydroxy-2-p-bromophenyl-5-pyrrolidone (IX), yellow, m. 169-71° (decomposition); VIII and 33% aqueous MeNH2, warmed 1 min., give the 1-Me derivative of IX, m. 145-8° (decomposition); this also results from VII and p-BrC6H4MgBr. p-MeOC6H4CH2CH2CO2H and Ac2O, warmed at 100° for 10 min., give γ-p-methoxyphenyl-γβ-crotonolactone, pink, m. 110-11°; warming with concentrated NH4OH at 100° for about 3 min. gives 2-hydroxy-2-p-methoxyphenyl-5-pyrrolidone, yellow, m. 133-5° (some decomposition); 33% aqueous MeNH2 gives the 1-Me derivative, m. 88-92°.

IT **861036-01-3**, 2-Pyrrolidone, 5-(p-bromophenyl)-5-hydroxy- (preparation of)

RN 861036-01-3 HCAPLUS

CN 2-Pyrrolidone, 5-(p-bromophenyl)-5-hydroxy- (4CI) (CA INDEX NAME)



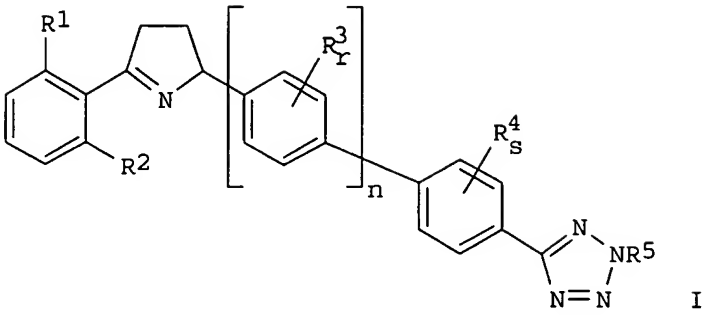
=> d l22 ibib abs hitstr tot

L22 ANSWER 1 OF 6 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 2002:733857 HCAPLUS
DOCUMENT NUMBER: 137:263039
TITLE: Preparation of pyrrolyl(bi)phenyl-2H-tetrazoles as **pesticides**
INVENTOR(S): Plant, Andrew; Maurer, Fritz; Marhold, Albrecht; Erdelen, Christoph; Turberg, Andreas; Hansen, Olaf
PATENT ASSIGNEE(S): Bayer AG, Germany
SOURCE: Ger. Offen., 36 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| DE 10113965 | A1 | 20020926 | DE 2001-10113965 | 20010322 |
| CA 2441334 | AA | 20021003 | CA 2002-2441334 | 20020312 |
| WO 2002076978 | A1 | 20021003 | WO 2002-EP2684 | 20020312 |
| W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG | | | | |
| EP 1379521 | A1 | 20040114 | EP 2002-722207 | 20020312 |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR | | | | |
| BR 2002008295 | A | 20040413 | BR 2002-8295 | 20020312 |
| CN 1509284 | A | 20040630 | CN 2002-809773 | 20020312 |
| JP 2004529131 | T2 | 20040924 | JP 2002-576236 | 20020312 |
| US 2004152904 | A1 | 20040805 | US 2003-472270 | 20031212 |

PRIORITY APPLN. INFO.: DE 2001-10113965 A 20010322
WO 2002-EP2684 W 20020312

OTHER SOURCE(S): MARPAT 137:263039
GI



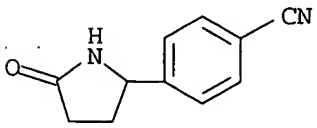
I

AB Title compds. [I; R1 = halo, Me; R2 = H, halo; R3, R4 = halo, (substituted) alkyl, alkoxy; R5 = H, alkylcarbonyl, (substituted) alkyl, alkylsulfonyl, cycloalkyl; n = 0, 1; r, s = 0-2], were prepared Thus, a mixture of 2-(4-bromophenyl)-5-(2,6-difluorophenyl)-3,4-dihydro-2H-pyrrole, 4,4,4',4',5,5,5',5'-octamethyl-2,2'-bi-1,3,2-dioxaborolan, KOAc, and PdCl2dppf was heated with DMF under Ar-atmospheric followed by cooling and addition of 2-ethyl-5-(4-bromophenyl)-2H-tetrazole (preparation given) to give, after 16 h stirring at 80°, 62% 5-(4'-[5-(2,6-difluorophenyl)-3,4-dihydro-2H-pyrrol-2-yl]-1,1'-biphenyl-4-yl)-2-ethyl-2H-tetrazole. The latter was said to kill of Heliothis virescens-caterpillars on Glycine max with a good efficiency.

IT **339087-31-9P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of pyrrolyl(bi)phenyl-2H-tetrazoles as **pesticides**)

RN 339087-31-9 HCAPLUS

CN Benzonitrile, 4-(5-oxo-2-pyrrolidinyl)- (9CI) (CA INDEX NAME)



L22 ANSWER 2 OF 6 HCAPLUS COPYRIGHT 2005 ACS on STN

ACCESSION NUMBER: 2002:240723 HCAPLUS

DOCUMENT NUMBER: 136:279329

TITLE: Preparation of optically active 2,5-diaryl-3,4-dihydropyrroles as **pesticides**

INVENTOR(S): Plant, Andrew; Geller, Thomas; Gallenkamp, Bernd; Grosser, Rolf; Marhold, Albrecht; Erdelen, Christoph; Turberg, Andreas; Hansen, Olaf

PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany

SOURCE: PCT Int. Appl., 129 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT: 1

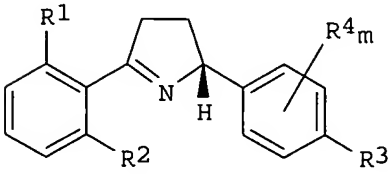
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|

| | | | | |
|---|---|---|---|---|
| WO 2002024643 | A1 | 20020328 | WO 2001-EP10424 | 20010910 |
| W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 10047110 | A1 | 20020418 | DE 2000-10047110 | 20000922 |
| AU 2002013897 | A5 | 20020402 | AU 2002-13897 | 20010910 |
| CA 2422958 | AA | 20030319 | CA 2001-2422958 | 20010910 |
| BR 2001014062 | A | 20030701 | BR 2001-14062 | 20010910 |
| EP 1322607 | A1 | 20030702 | EP 2001-982267 | 20010910 |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR | | | | |
| JP 2004509166 | T2 | 20040325 | JP 2002-529056 | 20010910 |
| NZ 524813 | A | 20040924 | NZ 2001-524813 | 20010910 |
| EG 23084 | A | 20040331 | EG 2001-997 | 20010918 |
| US 2004059129 | A1 | 20040325 | US 2003-380433 | 20030728 |
| PRIORITY APPLN. INFO.: | | | DE 2000-10047110 A | 20000922 |
| | | | WO 2001-EP10424 W | 20010910 |

OTHER SOURCE(S): MARPAT 136:279329

GI




I

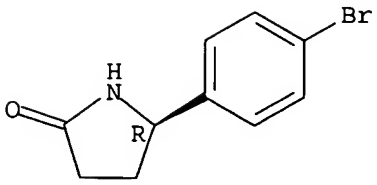
AB Title compds. [I; * = C with (R) configuration; m = 0-4; R1 = halo, Me; R2 = H, halo; R3 = H, halo, OH, (halo)alkyl, (halo)alkenyl, alkynyl, alkoxy, S(O)oR6, etc.; R4 = halo, (halo)alkyl, (halo)alkoxy, S(O)oR6; o = 0-2; R6 = H, (halo)alkyl], were prepared Thus, (+/-)-5-(2,6-difluorophenyl)-2-[4'-(trifluoromethoxy)-1,1'-biphenyl-4-yl]-3,4-dihydro-2H-pyrrole in n-heptanol/isopropanol was fractionally chromatographed with silica gel Chiralcel OD by HPLC to give 87.3% (2R)-5-(2,6-difluorophenyl)-2-[4'-(trifluoromethoxy)-1,1'-biphenyl-4-yl]-3,4-dihydro-2H-pyrrole (ee = 99.5%). The latter at 8 ppm gave 100% kill of Heliothis armigera after 6 days.

IT **405522-18-1P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of optically active diaryldihydropyrroles as **pesticides**)

RN 405522-18-1 HCAPLUS

CN 2-Pyrrolidinone, 5-(4-bromophenyl)-, (5R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



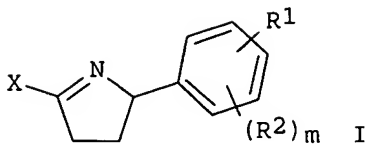

REFERENCE COUNT: 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L22 ANSWER 3 OF 6 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 2000:260281 HCAPLUS
DOCUMENT NUMBER: 132:279107
TITLE: Preparation of 5-aryl-2-heteroaryl-3,4-dihydro-2H-pyrroles as **pesticides.**
INVENTOR(S): Plant, Andrew; Alig, Bernd; Graff, Alan; Kraatz, Udo; Kramer, Wolfgang; Erdelen, Christoph; Turberg, Andreas; Mencke, Norbert
PATENT ASSIGNEE(S): Bayer Aktiengesellschaft, Germany
SOURCE: PCT Int. Appl., 239 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 2000021958 | A1 | 20000420 | WO 1999-EP7295 | 19991001 |
| W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 19847076 | A1 | 20000420 | DE 1998-19847076 | 19981014 |
| AU 9961988 | A1 | 20000501 | AU 1999-61988 | 19991001 |
| AU 761113 | B2 | 20030529 | | |
| EP 1121357 | A1 | 20010808 | EP 1999-948915 | 19991001 |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO | | | | |
| BR 9915544 | A | 20010814 | BR 1999-15544 | 19991001 |
| JP 2002527437 | T2 | 20020827 | JP 2000-575864 | 19991001 |
| US 6599924 | B1 | 20030729 | US 2001-807136 | 20010405 |

PRIORITY APPLN. INFO.:
DE 1998-19847076 A 19981014
WO 1999-EP7295 W 19991001

OTHER SOURCE(S): MARPAT 132:279107
GI



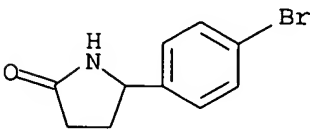
I

AB Title compds. [I; X = (substituted) 5-10 membered mono- or bicyclic heterocyclyl; R1 = halo, XA, BZD, YE; m = 0-4; R2 = H, halo, cyano, NO2, alkyl, alkoxy, haloalkyl, haloalkoxy, alkoxyalkoxy, SR3, SOR3, SO2R3; R3 = alkyl, haloalkyl; X = bond, O, S, CO, CO2, etc.; A = (substituted) Ph, naphthyl, tetrahydronaphthyl, 5-10 membered heterocyclyl; B = (substituted) p-phenylene; Z = O, S; D = H, alkyl, alkenyl, alkynyl, haloalkyl, haloalkenyl, (substituted) cycloalkyl, cycloalkenyl, phenylalkyl, etc.; ZD = (substituted) phenoxyalkyl; Y = bond, O, S, CO, CO2, alkylene, alkenylene, alkynylene, etc.; E = H, alkyl, alkenyl, alkynyl, haloalkyl, haloalkenyl, (substituted) cycloalkenyl, Ph, 5-6 membered heteroaryl], were prepared Thus, furan in THF at -30° was treated with BuLi and then with a solution of N-tert-butoxycarbonyl-γ-(4'-trifluoromethoxybiphen-4-yl)-γ-butyrolactam (preparation given) in THF followed by 2 h stirring at -20° and stirring overnight at room temperature to give 86% BOC-protected aminoketone, which was stirred overnight with CF3CO2H to give 86% 2-(2-furyl)-5-(4'-trifluoromethoxybiphen-4-yl)-3,4-dihydro-2H-pyrrole. Tested I at 0.1% on bean plants gave ≥95% kill of organophosphate-resistant Tetranychus urticae.

IT **207989-90-0P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of 5-aryl-2-heteroaryl-3,4-dihydro-2H-pyrroles as **pesticides**)

RN 207989-90-0 HCAPLUS

CN 2-Pyrrolidinone, 5-(4-bromophenyl)- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L22 ANSWER 4 OF 6 HCAPLUS COPYRIGHT 2005 ACS on STN

ACCESSION NUMBER: 1999:753208 HCAPLUS

DOCUMENT NUMBER: 131:351232

TITLE: Preparation of 5-aryl-2-(2-chlorophenyl)-3,4-dihydro-2H-pyrroles as **pesticides**.

INVENTOR(S): Plant, Andrew; Graff, Alan; Kraatz, Udo; Erdelen, Christoph; Turberg, Andreas; Mencke, Norbert

PATENT ASSIGNEE(S): Bayer A.-G., Germany

SOURCE: PCT Int. Appl., 159 pp.
CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: German

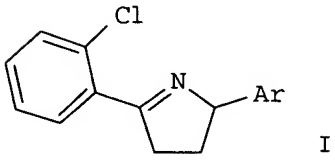
FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 9959968 | A1 | 19991125 | WO 1999-EP3063 | 19990505 |
| W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | |
| RW: GH, GM, KE, LS, MW, SD, SL, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG | | | | |
| DE 19822247 | A1 | 19991125 | DE 1998-19822247 | 19980518 |
| CA 2332723 | AA | 19991125 | CA 1999-2332723 | 19990505 |
| AU 9941384 | A1 | 19991206 | AU 1999-41384 | 19990505 |
| AU 747396 | B2 | 20020516 | | |
| BR 9910539 | A | 20010116 | BR 1999-10539 | 19990505 |
| TR 200003389 | T2 | 20010221 | TR 2000-200003389 | 19990505 |
| EP 1080072 | A1 | 20010307 | EP 1999-924878 | 19990505 |
| EP 1080072 | B1 | 20040804 | | |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, NL, SE, PT, IE, FI | | | | |
| JP 2002515483 | T2 | 20020528 | JP 2000-549587 | 19990505 |
| AT 272622 | E | 20040815 | AT 1999-924878 | 19990505 |
| ES 2224666 | T3 | 20050301 | ES 1999-924878 | 19990505 |
| US 6489490 | B1 | 20021203 | US 2000-700289 | 20001113 |
| PRIORITY APPLN. INFO.: | | | DE 1998-19822247 A | 19980518 |
| | | | WO 1999-EP3063 W | 19990505 |

OTHER SOURCE(S): MARPAT 131:351232

GI



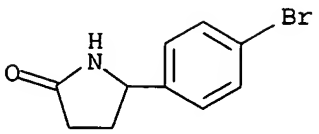

I

AB Title compds. (I; Ar = substituted Ph), were prepared Thus, 2-(2-chlorophenyl)-5-(4-bromophenyl)-3,4-dihydro-2H-pyrrole (preparation given) was stirred with 4-trifluoromethoxyphenylboronic acid, K2CO3, and Pd(PPh3)2Cl2 in dimethoxyethane/H2O to give 11.2% 2-(2-chlorophenyl)-5-(4-trifluoromethoxy-4,4'-biphenyl-1-yl)-3,4-dihydro-2H-pyrrole. The latter at 0.004% on soybeans gave 100% kill of Heliothis armigera.

IT **207989-90-0P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of 5-aryl-2-(2-chlorophenyl)-3,4-dihydro-2H-pyrroles as **pesticides**)

RN 207989-90-0 HCAPLUS

CN 2-Pyrrolidinone, 5-(4-bromophenyl)- (9CI) (CA INDEX NAME)

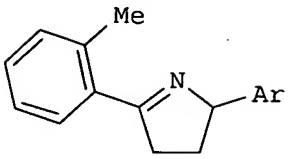


REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L22 ANSWER 5 OF 6 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1999:753207 HCAPLUS
DOCUMENT NUMBER: 131:351231
TITLE: Preparation of 2-(2-methylphenyl)-5-aryl-3,4-dihydro-2H-pyrroles as **pesticides.**
INVENTOR(S): Plant, Andrew; Backhaus, Dirk; Erdelen, Christoph; Turberg, Andreas; Mencke, Norbert
PATENT ASSIGNEE(S): Bayer A.-G., Germany
SOURCE: PCT Int. Appl., 146 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

| PATENT NO. | KIND | DATE | APPLICATION NO. | | DATE |
|---|---|---|---|---|---|
| WO 9959967 | A1 | 19991125 | WO 1999-EP3062 | | 19990505 |
| W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM | | | | | |
| RW: GH, GM, KE, LS, MW, SD, SL, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG | | | | | |
| DE 19822245 | A1 | 19991125 | DE 1998-19822245 | | 19980518 |
| CA 2332522 | AA | 19991125 | CA 1999-2332522 | | 19990505 |
| AU 9940369 | A1 | 19991206 | AU 1999-40369 | | 19990505 |
| AU 742032 | B2 | 20011213 | | | |
| BR 9910540 | A | 20010130 | BR 1999-10540 | | 19990505 |
| EP 1077938 | A1 | 20010228 | EP 1999-923526 | | 19990505 |
| EP 1077938 | B1 | 20050413 | | | |
| R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, NL, SE, PT, IE, FI | | | | | |
| TR 200003390 | T2 | 20010321 | TR 2000-200003390 | | 19990505 |
| JP 2002515482 | T2 | 20020528 | JP 2000-549586 | | 19990505 |
| AT 293099 | E | 20050415 | AT 1999-923526 | | 19990505 |
| US 6632833 | B1 | 20031014 | US 2000-700288 | | 20001113 |
| PRIORITY APPLN. INFO.: | | | DE 1998-19822245 | A | 19980518 |
| | | | WO 1999-EP3062 | W | 19990505 |

OTHER SOURCE(S): MARPAT 131:351231
GI



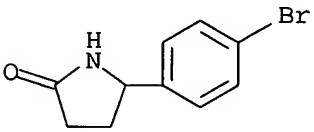

I

AB Title compds. [I; Ar = (substituted) Ph], were prepared Thus, 1-tert-butoxycarbonylamino-1-[4'-trifluoromethoxybiphenyl-4-yl]-3-[O-methylbenzoyl]propane (preparation given) in CH2Cl2 was treated with CF3CO2H to give 93.1% 2-(2-methylphenyl)-5-[4'-trifluoromethoxybiphen-4-yl]-3,4-dihydro-2H-pyrrole. The latter at 0.004% on cabbage leaves gave 100% kill of Plutella xylostella after 6 days.

IT **207989-90-0P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of 2-(2-methylphenyl)-5-aryl-3,4-dihydro-2H-pyrroles as **pesticides**)

RN 207989-90-0 HCAPLUS

CN 2-Pyrrolidinone, 5-(4-bromophenyl)- (9CI) (CA INDEX NAME)




REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L22 ANSWER 6 OF 6 HCAPLUS COPYRIGHT 2005 ACS on STN
ACCESSION NUMBER: 1998:352816 HCAPLUS
DOCUMENT NUMBER: 129:27884
TITLE: Preparation of aryl-substituted cyclic imines as **pesticides.**
INVENTOR(S): Plant, Andrew; Kleefeld, Gerd; Potter, Thorsten; Erdelen, Christoph; Mencke, Norbert; Turberg, Andreas; Wachendorff-Neumann, Ulrike
PATENT ASSIGNEE(S): Bayer A.-G., Germany; Plant, Andrew; Kleefeld, Gerd; Potter, Thorsten; Erdelen, Christoph; Mencke, Norbert; Turberg, Andreas; Wachendorff-Neumann, Ulrike
SOURCE: PCT Int. Appl., 128 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

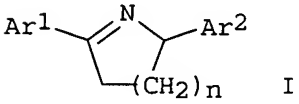
| PATENT NO. | KIND | DATE | APPLICATION NO. | DATE |
|---|---|---|---|---|
| WO 9822438 | A1 | 19980528 | WO 1997-EP6186 | 19971107 |

W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GH, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG,

US, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG

| | | | | | |
|---|---|---|---|---|---|
| DE 19648011 | A1 | 19980528 | DE 1996-19648011 | | 19961120 |
| AU 9853197 | A1 | 19980610 | AU 1998-53197 | | 19971107 |
| AU 737059 | B2 | 20010809 | | | |
| EP 942901 | A1 | 19990922 | EP 1997-950138 | | 19971107 |
| EP 942901 | B1 | 20030305 | | | |
| R: BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT | | | | | |
| CN 1244860 | A | 20000216 | CN 1997-181458 | | 19971107 |
| BR 9713520 | A | 20000321 | BR 1997-13520 | | 19971107 |
| NZ 335798 | A | 20001027 | NZ 1997-335798 | | 19971107 |
| JP 2001506592 | T2 | 20010522 | JP 1998-523151 | | 19971107 |
| EP 1306371 | A1 | 20030502 | EP 2003-371 | | 19971107 |
| R: BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, PT | | | | | |
| PT 942901 | T | 20030731 | PT 1997-950138 | | 19971107 |
| ES 2190803 | T3 | 20030816 | ES 1997-950138 | | 19971107 |
| IL 129857 | A1 | 20040219 | IL 1997-129857 | | 19971107 |
| TW 572730 | B | 20040121 | TW 1997-86117105 | | 19971117 |
| KR 2000053185 | A | 20000825 | KR 1999-704146 | | 19990510 |
| US 6274613 | B1 | 20010814 | US 1999-297964 | | 19990511 |
| US 6399771 | B1 | 20020604 | US 2000-659041 | | 20000909 |
| US 2002151571 | A1 | 20021017 | US 2001-28648 | | 20011219 |
| US 6770595 | B2 | 20040803 | | | |
| US 2004186287 | A1 | 20040923 | US 2004-768294 | | 20040130 |
| PRIORITY APPLN. INFO.: | | | DE 1996-19648011 | A | 19961120 |
| | | | EP 1997-950138 | A3 | 19971107 |
| | | | WO 1997-EP6186 | W | 19971107 |
| | | | US 1999-297964 | A3 | 19990511 |
| | | | US 2000-659041 | A3 | 20000909 |
| | | | US 2001-28648 | A3 | 20011219 |

OTHER SOURCE(S): MARPAT 129:27884
GI



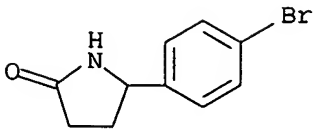

I

AB Title compds. (I; Ar1, Ar2 = (substituted) Ph; n = 1, 2, 3), were prepared Thus, 1-tert-butoxycarbonylamino-3-(2,6-difluorobenzoyl)-1-phenylpropane (preparation given) was treated with CF3CO2H at 0° to room temperature to give 83% 2-(2,6-difluorophenyl)-5-phenyl-3,4-dihydro-2H-pyrrole. The latter at 0.1% gave 90% kill of Myzus persicae on cabbage leaves.

IT **207989-90-0P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of aryl-substituted cyclic imines as **pesticides**)

RN 207989-90-0 HCAPLUS

CN 2-Pyrrolidinone, 5-(4-bromophenyl)- (9CI) (CA INDEX NAME)




REFERENCE COUNT: 8 THERE ARE 8 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

=> log y

| COST IN U.S. DOLLARS | SINCE FILE ENTRY | TOTAL SESSION |
|---|---|---|
| FULL ESTIMATED COST | 79.00 | 711.12 |

| DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) | SINCE FILE ENTRY | TOTAL SESSION |
|---|---|---|
| CA SUBSCRIBER PRICE | -10.95 | -27.74 |

STN INTERNATIONAL LOGOFF AT 16:33:35 ON 29 AUG 2005